STATISTICAL ACCOUNT OF BENGAL.

BY W. W. HUNTER, B.A., LL.D.,

DIRECTOR-GENERAL OF STATISTICS TO THE GOVERNMENT OF INDIA;

ONE OF THE COUNCIL OF THE ROYAL ASIATIC SOCIETY; HONORARY ... OF THE ROYAL INSTITUTE OF NETHERLANDS INDIA AT THE HAGUE, ... INSTITUTE ... DA GAMA OF PORTUGUESE INDIA, OF THE DUTCH SOCIETY ... JAVA, AND ... THE ETHNOLOGICAL SOCIETY, LONDON; HONORARY FELLOW OF THE CALCUTTA UNIVERSITY; ORDINARY FELLOW OF THE ROYAL GEOGRAPHICAL SOCIETY, ETC.

BENGAL SECRETARIAT LIBRARY.

VOLUME XVI.

DISTRICTS OF HAZÁRIBÁGH AND LOHÁRDAGÁ.

THIS VOLUME HAS BEEN COMPILED BY

H. H. RISLEY, ESQ., C.S.,

ASSISTANT TO THE DIRECTOR-GENERAL OF STATISTICS.

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PREFACE

TO VOLUME XVI. OF

THE STATISTICAL ACCOUNT OF BENGAL

THIS Volume deals with two Districts on the eastern edge of the plateau which rises towards Central India. The intense verdure and fertile flats of the Gangetic Valley here give place to mountainous ridges, peaks covered with primeval jungle, and long stretches of upland yielding comparatively meagre crops. The water-supply, although not insufficient in quantity, rushes rapidly off to the low-lands on the east, and throughout large tracts leaves only dry torrent-beds to mark its course. Between the higher levels, however, lie valleys and nooks of brilliant green, while the forests supply unlimited pasture for cattle. This remote plateau forms the retreat of the aboriginal races, who, having imperfectly accepted the mere externals of Hinduism, afford a favourable field for Christian missions. It is from these races, too, that European capitalists in Bengal have drawn their chief supply of hired labour. The more northerly of the two Districts, Hazáribágh, as lying nearest to the plain of Behar, contains a considerable element of Hindustání lowlanders; the southern District, Lohárdagá, still retains its primitive inhabitants, either under the native Rájá of Chutia Nágpur, or on the British Government-estate of Palámau.

The two Districts, although backward in agriculture and civilisation, have a wealth of their own. Mines of copper, tin, and mica exist, and may perhaps become seats of profitable enterprise; gold-dust is washed in the rivers; iron has been wrought from the earliest times; and the coal-field of Karharbálí bids fair to supplant the earlier workings in more advanced localities.

In Hazáribágh District rises the peak of Parásnáth, with its glistening white temples of the Jain faith, thronged at stated festivals by pilgrims. It has been rejected as a sanitarium for European troops, but its slopes now form the site of a promising tea plantation.

The total area dealt with in this Volume amounts to 19,065 square miles, containing in 1872 a population of 2,008,998 souls.

W W. H.

1877

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I SHALL be grateful for any corrections or suggestions which occur to the reader. They may be addressed to me, at the India Office, Westminster. W. W. H.

INTRODUCTORY NOTE.

WEIGHTS AND MEASURES.

THE local weights and measures are given in detail at pp. 110–111, and 358–361. In some instances, in the following volume, these weights and measures have been converted into their English equivalents, and the native names have not been added. In such cases the reconversion from the English equivalents may be effected with sufficient accuracy in accordance with the following tables:—

MONEY.

1 pie ($\frac{1}{12}$ of an ánná) = $\frac{1}{2}$ farthing.
1 pice ($\frac{1}{4}$ of an ánná) = $1\frac{1}{2}$ farthings.
1 ánná ($\frac{1}{16}$ of a rupee) = $1\frac{1}{2}$ pence.

The rupee is worth, according to the rate of exchange, from 1s. 8d. to 2s., but for conventional purposes it is taken at 2s.

WEIGHTS.

The unit of weight is the ser (seer), which varies in different Districts from about $1\frac{1}{2}$ lbs. to 2·205 lbs. This latter is the standard ser as fixed by Government, and corresponds to the metrical kilogramme. For local calculations in Lower Bengal, the recognised ser may be taken at 2 lbs. The conversion of Indian into English weights would then be as follows:—

1 chaták ($\frac{1}{16}$ of a ser) = 2 oz.
1 ser ($\frac{1}{40}$ of a maund) = 2 lbs.
1 man or maund (say) = 82 lbs.

LAND MEASURE.

The unit of land measure is the bighá, which varies from $\frac{1}{3}$ of an acre to almost 1 acre. The Government standard bighá is 14,400 square feet, or say $\frac{1}{3}$ of an acre; and this bighá has been uniformly adopted throughout the following volume, unless otherwise specified.

STATISTICAL ACCOUNT

OF

THE DISTRICT OF HAZÁRIBÁGH.[1]

THE DISTRICT OF HAZÁRIBÁGH forms the north-eastern portion of the Chutiá Nágpur Division, and is situated between 23° 25′ 0″ and 24° 48′ 0″ north latitude, and 84° 29′ 0″ and 86° 38′ 0″ east longitude. It contains a population of 771,875 souls, as ascertained by the Census of 1872; and a total area, including a recent transfer from the neighbouring District of Gayá, of 7,022 square miles. Hazáribágh, the chief town and administrative head-quarters, situated in 23° 59′ 0″ north latitude and 85° [illegible] 0″ east longitude, gives its name to the District.

BOUNDARIES.—Hazáribágh is bounded on the north by the Dis[illegible]

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[1] The principal materials from which this Statistical Account is compiled are:—(1) Answers to the Five Series of Questions furnished by the Deputy Commissioner to the Director-General of Statistics. (2) Medical Return prepared by the Civil Surgeon. (3) Census Report of 1872. (4) Geographical Data furnished by the Surveyor-General. (5) Annual Reports of the Commissioner of Chutiá Nágpur Division. (6) Colonel Dalton's *Ethnology of Bengal*. (7) Bengal Forest Report. (8) Special Report on the Land Tenures of Hazáribágh, by Colonel H. M. Boddam, Deputy Commissioner. (9) Annual Reports of the Inspector-General of Police for 1870 and 1871. (10) Statistics furnished by the Inspector-General of Jails for 1856–57, 1860–61, and 1870, and Inspector-General's Report for the latter year. (11) Statistics furnished by the Director-General of the Post-Office. (12) Statistics compiled from the Reports of the Director of Public Instruction for 1860–61, 1870–71, 1871–72, and 1872–73. (13) Report on the Charitable Dispensaries of Bengal for 1872. (14) Bengal Meteorological Report for 1871. (15) Reports of Geological Survey. (16) Mr Rickett's Report on the District; and a variety of personal inquiries.

tricts of Gayá and Monghyr, on the east by the Santál Parganás and Mánbhúm District, on the south by Lohárdagá District, and on the west by the Districts of Lohárdagá and Gayá. The course of the administrative limits is not defined by natural boundaries. Isolated portions of the south-western boundary are marked by the Amánat, Dámodar, and Subarnarekhá rivers; and the northern boundary of the District corresponds roughly with the base of the range of hills that rises from the plain of Gayá District.

EARLY HISTORY OF HAZÁRIBÁGH DISTRICT.—The early history of the District is involved in an obscurity from which, owing to the loss of records at the time of the Mutiny in 1859, and the absence of any trustworthy native sources of information, it is never likely to emerge. From a brief Account of the District which I found among the correspondence of the year 1837, I gather that about 1755 A.D. one Mukund Sinh was Rájá of Rámgarh, and the recognised chief of the country; while his relative, Tej Sinh, had control of the rural levies which made up the local army. Both of them claimed descent from two Rájput brothers, immigrants from Bundelkhand. The elder of these obtained the present *zamíndárí* of Rámgarh from the Mahárájá of Chutiá Nágpur, by doing homage and receiving the *tilak*, or mark of investiture on the forehead from that chieftain's great toe. This tradition of a foreign origin, and assumption of Rájput descent, are palpable devices to conceal the obvious Kharwár blood, which, in spite of frequent intermarriages with the higher castes, is still to be traced in the family lineaments. In 1771 Tej Sinh, at the instigation of a certain Lála Bahádur Sinh, of Fathipur in Gayá, turned traitor, and went off to assert his claims to the estate before Captain Camac at Patná. He returned with a European force under Lieutenant Goddard; Mukund Sinh fled after a mere show of resistance, and the Rámgarh estate was made over to Tej Sinh for a tribute of Rs 40,000 a year. It does not appear, however, that Lieutenant Goddard took formal possession of the territory thus won, nor did his expedition extend to the north-western portion of the District, known as *parganá* Kharakdihá. Six years earlier (1765), Mod Náráyan Deo, the old Hindu Rájá of Kharakdihá, and chieftain of the *ghátwáls*, or guardians of the passes, being driven from his estate by the Musalmán *ámil*, or revenue agent, Kámdár Khán, had taken refuge with Tej Sinh at Rámgarh, and received a grant of two villages by way of maintenance. Kámdár Khán's rule in Kharak-

dihá was followed by that of Ikbál Ali Khán, who was driven out in 1774 for tyranny and mismanagement, by a British force under Captain James Brown. The exiled Rájá of Kharakdihá, who had exerted his influence on the British side, was rewarded with a grant of the *nánkár*, or maintenance lands of the Ráj. Possibly he might have been completely reinstated in his former position, but that in the confusion of Muhammadan misrule the *ghátwáls* had grown too strong to return to their old allegiance, and demanded and obtained separate settlements. The *sanads* granted to them by Captain Brown were modelled on those of the Muhammadan *ámils*, and bear dates ranging from 1775 to 1777. In these grants the *ghátwáls* are recognised as petty feudal chiefs, holding their land subject to the obligations of being responsible for crime committed on their estates, and of being called on to produce the offender, or to refund any stolen property. They were also liable to removal for misconduct, and were bound to maintain a body of police, and to keep the roads in repair. By the year 1780 it would seem that the *ghátwáls* had been pacified, and Captain Brown's military administration had come to an end. The estate of Rámgarh and the Fiscal Division of Kharakdihá formed part of a British District, under the name of Rámgarh, and the offices of Judge, Magistrate, and Collector were vested in Mr Chapman, with a provision that the judicial authority should be considered distinct from and independent of the revenue functions. His Court was held alternately at Sherghátí, now in Gayá District, and at Chátrá, thirty-six miles north-west of the present head-quarters station. At Hazáribágh itself was posted a contingent of native infantry, known as the Rámgarh Battalion, under a European officer. Until 1793, appeals (both civil and criminal) lay direct to the Governor-General at Calcutta, but in that year the Rámgarh Court was placed under the jurisdiction of the Provincial Court of Appeal of the city of Patná. In 1780 the District of Rámgarh embraced nearly three times the present area of Hazáribágh, stretching up on the north-west to Sherghátí in Gayá, and taking in on the east *parganá* Chakái of Monghyr, and the *zamíndárí* Ráj of Pánchet; while on the south-west and south, Palámau was regularly included in the District, and Chutiá Nágpur owed a loose allegiance as a tributary *mahal*, administered by its own chief. In 1787 Mr J. Grant, Chief Serishtádár, writes of it (Fifth Report, vol. i. p. 503) as "an elevated region which forms part of Soubah Behar, containing nearly 18,000 square

miles, though proportionably (to Behar and Tirhut) of very inconsiderable value. This highland district, including the modern subdivisions of Palamow, Ramgur, and Chutea Nagpoor, bounded on the west by the Soubah of Allahabad, on the south Orissa, and on the east Bengal, hath since the age of Ptolemy been geographically termed the three Bellads or Cantons, in Arabic." In another place he states that in 1765 the net revenue of "Pendach or Palamow, with the velayt of Kokerah, or Nagpoor, and Ramgur together, 18,553 British square miles," was estimated by Muhammad Rezá Khán at 109,615 *sikká* rupees. From 1781 to 1817 the fiscal administration of Rámgarh was supervised by the Committee of Revenue in Calcutta. Regulation I. of 1816 appointed a separate Commissioner for the superintendence of the revenues of Behar and Benares, and by Regulation I. of 1817 his authority was extended to the District of Rámgarh. By Regulation I. of 1829, it was brought within the jurisdiction of the Commissioner of Revenue and Circuit for the Division of Patná.

During the period that elapsed from 1780 to 1833 the District was governed in general accord with the ordinary Regulations. An exception indeed was made in favour of the custom of primogeniture, by the special Regulation X. of 1800; and even before that year, I have been unable to discover any cases of estates being subjected to the Law of Partition. The sale of estates for arrears of land revenue was, however, occasionally resorted to; the action of the civil court was generally in favour of the foreign money-lenders, rather than of the old standing landholders of the District; and it is clear that in both civil and criminal business equitable considerations were everywhere outweighed by legal ones. In short, the administration of Rámgarh had all the faults of a rigidly legal system, applied unscrupulously over an unwieldy extent of country, by officials who had the scantiest knowledge of the people with whom they were dealing. British rule was made peculiarly distasteful to the aboriginal races, by the fact that all the native subordinates were foreigners from Behar and Bengal; and the smouldering discontent of the tribes broke out on two occasions, in 1820 and 1831, into open revolt. The great Kol insurrection of 1831 was followed by an entire change in the administrative system. By Regulation XIII. of 1833, the Districts of Rámgarh and the Jungle Mahals, with the estate of Dhalbhám till then included in Midnapur, were exempted from the operation of the Regulations; and every branch

of government within these tracts was vested in an officer appointed by the Supreme Government, styled the Agent to the Governor-General. The *parganás* of Rámgarh, Kharakdihá, Kendi, and Kundá, which compose the present area of the District, thus became part of the South-West Frontier Agency, and were formed into a Division under the name of Hazáribágh. The administrative head-quarters, which had formerly been alternately at Sherghátí and Chátrá, was transferred to Hazáribágh, where the troops of the Rámgarh Battalion had been stationed since the end of the last century. The chief executive officer was now styled the Principal Assistant to the Governor General's Agent, and he was guided in his administration by a series of rules for criminal justice prescribed by the Governor-General in Council, under the provisions of sect. 5 of Regulation XIII. of 1833. These criminal rules continued in force till they were superseded by the Criminal Procedure Code (Act XXV. of 1861), which was immediately extended to the Districts of the Chutiá Nágpur Division. It was subsequently held in 1864 that the Code was extended to so much only of the Singbhúm District as is comprised in Dhalbhúm and the Kolbán, the remaining estates being administered in the Political Department. As regards the administration of civil justice, a set of rules was proposed by the Agent at the same time that the criminal rules were laid before Government, but orders on them were suspended pending the promulgation of a Bill on the subject, then under preparation. This Bill was never passed; and till Act VIII. of 1859 was extended to the Division, there was no specific law or rule to guide the procedure of the Civil Courts in the Province, but they followed the Regulations, except in points where some order of the Agent interposed. From the first creation of the Agency, the ordinary laws for the sale of land for debt or arrears of rent were regarded as inapplicable to the Province; and the rules proposed by Captain Wilkinson provided that no sale or alienation, or even mortgage, of hereditary or immovable property was to take place without the sanction of the Agent. This rule has always been acted on as regards sales, and forms one of the most peculiar features of the administration of the Division; and in extending the Civil Procedure Code to the Districts of Hazáribágh, Lohárdagá, and Mánbhúm, a proviso to this effect was added to the notification. The Code was not extended to Singbhúm, but is considered in force in the Dhalbhúm estate of that District. The remainder of Singbhúm, so far as regards civil rules, is administered

in the Political Department, as are the Tributary States; the appeals from the Chiefs and Deputy Commissioner lying to the Commissioner, not to the Judicial Commissioner and High Court. By Act XX. of 1854, the designation of the Province was changed from South-Western Frontier Agency to Chutiá (Chhotá) Nágpur, and it has been administered since that date as a Non-Regulation Province under the Lieutenant-Governor of Bengal. At the same time, the title of the chief executive officer was changed from Governor-General's Agent to Commissioner.

JURISDICTION.—The revenue, civil, and magisterial jurisdiction of the entire District is conterminous. The jurisdictions of the local subordinate judges (*munsifs*) do not, however, coincide with those of the subdivisional officers in the revenue and magisterial departments.

GENERAL ASPECT.—The following is quoted from a Report on the Roads and Passes of Hazáribágh, by Major J. Sconce, Deputy Superintendent of Revenue Survey:—Hazáribágh District forms part of the chain of high land, sometimes a range of hills, sometimes a high cultivated plateau, which extends across the continent of India south of the Narbadá river on the west, and south of the Són river on the east. This chain has nearly reached its eastern extremity in Hazáribágh District, the rivers begin to take an easterly course, and the general level of the country begins to lower. Hazáribágh, therefore, can neither be considered entirely an elevated plateau, nor does it contain any extensive range of high hills; but both features are met with, and viewing the elevated face of the District from the plains of Behar on the north, it may well be considered to hold a part of the extensive highland chain. This elevated northern face, not scarped, but most clearly defined, is an excellent starting-point from which to commence a description of the general features of the District. The appearance from the north is that of a range of hills uniform in height; but in reality, this is the face of the plateau elevated about 800 feet from the level of the Gayá plain. The edge of the eastern portion of this elevated plateau forms a well-defined watershed, between the heads of the tributaries of the rivers of Gayá District and those of the Barákhar river, which traverses Hazáribágh District in an easterly direction, the slope to the Barákhar river being uniform and gentle through an undulating and well-cultivated country. This general slope of the country continues beyond the Barákhar river, until the elevated plateau finally

disappears in the lower plains of Bengal, without having any abrupt face to the south, as has been described in the north. The western portion of the elevated face is of a different character; here the streams of the plateau, the Mohaní, the Lilájan, and the Morhar, flow northwards, and become important rivers to water the Gayá plain. The extensive plateau which has thus been described has a general elevation of 1300 feet; but a more limited and higher plateau has still to be mentioned, on which the station of Hazáribágh obtains its desirable elevation of 2000 feet above sea-level. This second elevated step is about 15 miles south of the first ascent from the Gayá plain; it has an abrupt face on all sides, and is indeed the only rightly-called table-land of the District. Its extent is about 40 miles east and west, by 15 miles north and south, and the height of the station, 2000 feet, may be considered to be its average elevation. South from this plateau, there is a constant descent through varied and broken country to the Dámodar river, which flows at a distance averaging 15 miles from the southern face. The Dámodar river, which from its rise has been skirting the base of the elevated plateau of Chutiá Nágpur, here recedes from it, and the first portion of the Dámodar valley, as a wide and important feature, is now formed.

The physical formation of Hazáribágh may be described as exhibiting three distinct features. (1) The high central plateau. This plateau extends from the western boundary, and occupies a central position in the western section of the District. The surface is undulating; there are many prosperous villages, and a fair extent of cultivation. (2) The lower plateau. This is a true table-land as far as it extends along the northern portion of the District; in the east, the general elevation of the country is lower, and the character of the country as a plateau is lost in the deeper depressions of the streams. To the north, the land is well cultivated, and there is hardly a trace of rock or jungle; to the east the country is of a much more varied character. (3) The valley of the Dámodar. The central valley of the Dámodar river, with the country which is watered by its numerous feeders, occupies the entire southern section of the District. There is, necessarily, much variety of feature in this wide-spreading tract; but the chief characteristics are extensive jungle and scattered villages. There are exceptions, however, to this general description in the well-

cultivated Karanpurá valley, and in the several rich rice-fields in *parganás* Paláni, Changarhá, and Golá.

The surface of the District of Hazáribágh to a large extent consists of rock and ravine. Central tracts, notably the northern portion of the lower plateau, exhibit a continuous expanse of undulating country, rich in soil, and devoid of hills, where much valuable rice-land has been obtained after laborious construction, and where the cultivated uplands, generally studded with *mahuá* trees or groves of mango, have given parts of the District the "park-like appearance" which has been so frequently remarked. Many favoured spots of this character are met with in all parts of the District, but they are exceptional features, and the District must always be characterised as one of rock, hill, and extensive jungle. It cannot be said to be fully occupied; much good land still remains to be cleared in the valley of the Dámodar, and many suitable situations for the construction of rice-terraces are still untouched.

The general aspect of the country is pleasing. The rich red of the tilled soil contrasts well with the varied colours of the tree foliage, the greyish-green of the jungle grass, and the dark rock which crops up at intervals. Abrupt ascents or descents and winding passes continually open up fresh points of view; rocky hills, wooded almost to their summits, are dotted over the area, sometimes forming part of a range, and sometimes rising as isolated eminences from the table-land, so that even in the most level parts of the District, the horizon is marked by a background of purple hills in outline against the sky.

The geological character of Hazáribágh District has not yet been finally determined; but it appears from scattered Memoirs of the Geological Survey that the base both of the higher and the lower plateau consists of gneiss, granite, hornblende, and other crystalline rocks, irregularly overlaid by three sedimentary formations—the Tálcher, Dámodar, and Pánchet series. At the base of the oldest of the three, the Tálcher series, occurs a boulder bed, or conglomerate, containing pebbles of quartz and gneiss, which is stated to resemble the beach deposits of the island of Penang. The point is still under discussion; but if this bed is a true littoral deposit, it would appear that the southern part of the District has passed through three stages since the upheaval of the crystalline rocks. The first of these was a marine era, when the boulder beds were deposited by the surf on the lower levels of the gneiss hills,

which were then islets in the Tálcher sea, or, if ranges, were the boundaries of estuaries. This was followed by a fluvial era, during which the carboniferous Dámodar series and the sandstone of Pánchet were deposited. Last of all, after the upheaval of the sedimentary beds, there commenced an era of rapid denudation, which continues still, and during which the present superficial contour of the country has been sculptured by the combined action of rivers, wind, and rain.

HILL SYSTEM.—The central plateau of Hazáribágh has a well-defined face on all sides except on the west. In this direction the plateau becomes narrow, and gradually descends in elevation as it advances westward, till the final slope can hardly be traced among the other undulations of the country. Near the western limit, the connection of the plateau with the high continental range which has been referred to above is readily traced. The connection is the line of watershed between the feeders of the Dámodar river on the east and the feeders of the Kóél river, a large branch of the Són, on the west. This watershed is not a range of hills, but an elevated ridge extending through *parganá* Tori of Chutiá Nágpur District, and joining the high plateau of Chutiá Nágpur where the Dámodar river takes it rise.

In considering the hills of Hazáribágh, the central plateau is the most important feature. Its western portion is a broad watershed between the feeders of the Dámodar river on the south, and the sources of the Lilájan and Mohaní rivers, both of which traverse the District of Gayá and flow north to join the Ganges. In this western portion there are several prominent isolated hills, the highest, which are named from the neighbouring villages, being Kasiátu, Hesátu, and Hadwá; these are elevated about 600 feet above the plateau, and overlook the valley of the Dámodar. Farther east, in the neighbourhood of the station of Hazáribágh, there are four rocky eminences of the same character, the highest of which, Chendwár, rises 800 feet above the plateau, and attains an extreme elevation of 2816 feet above the sea. The eastern portion of the plateau, which is in breadth about fifteen miles, does not form any regular watershed; its formation is cuplike, with elevated edges, from which the drainage finds one outfall to the east by the Kunar river. The most important hill on the elevated edge is the Jilingá hill, which forms the final termination of the plateau on the south-east. Jilingá hill attains an elevation of 1050 feet above

the plateau, and above the sea-level its height is 3057 feet. It has a very extensive base; the upper slopes are rounded, and on the southern face some very suitable land has been taken for the cultivation of tea. The eastern face of the plateau is devoid of any very prominent features, but somewhat in advance there are several isolated hills. Among these are Maḥábar Járimo, height 2185 feet; and Barsot hill, height 2120 feet. To the north, the range, which is almost detached from the plateau, overlooks the Grand Trunk Road near Barhí; and on the north-west, two prominent hills, named Sindraili, 2216 feet, and Máhuda, 2409 feet, stand a little in advance, but are still connected with the plateau. To the south, an important offshoot, which divides *parganá* Karanpurá from the rest of the Dámodar valley, extends from the plateau almost to the Dámodar river; and at its termination there is a high peaked hill, 2463 feet, which is named Aswa, from the village at its base. In one part of this southern extension there is a small plateau and a few villages.

To the south of the plateau, but quite detached, Lugu hill is of remarkable features and of great prominence; it is scarped on all sides and forms a natural fortress. The northern face has an exceedingly bold scarp of 2200 feet in height; and the highest part of the hill attains an elevation of 3203 feet above the sea. The hill is separated from Jilingá hill, which has been already described, by the Bokáro river. These two hills, as it were, stand opposite each other, separated by the narrow gorge through which the Bokáro flows. Máhudi is another detached hill of the same character as Lugu. It is situated in the Karanpurá *parganá*, distant about eight miles from the southern face of the Hazáribágh plateau. The hill covers a greater surface than Lugu, but the scarp is not so high. The average height of the scarp, which extends on all sides, is 800 feet; and the extreme elevation of the central ridge above the sea is 2437 feet. Máhudi hill has a remarkable outwork, as it may be called, in shape like a crescent, detached from its northern face. A tea-plantation has been very successfully established on Máhudi (its operations will be described in detail on a subsequent page). West from this hill, and separated from it by the Gahri river, there is a small scarped hill of a similar character, called Sátpahri.

The hills within Hazáribágh District to the south of the Dámodar river are the spurs from the Chutiá Nágpur plateau, the crest of the plateau being assumed in a general way to be the

boundary of the District. Barágái or Marang Buru is a hill of great prominence, which rises on the edge of the plateau, and is divided between the two Districts. The hill rises 2400 feet above the valley of the Dámodar, 1300 feet above the Chutiá Nágpur plateau, and attains an extreme elevation above the sea of 3445 feet. It has broad rounded features, and there is a considerable extent of *jám* or jungle-burning cultivation on the upper slopes. On the south-east of the District, a table-land extends into Golá *parganá* from Mánbhúm District. This small plateau is elevated about 700 feet above the valley of the Dámodar; and the extreme elevation is 2083 feet above the sea. A few villages are situated on the plateau, and it is partially cultivated.

In the east of the District, on the boundary of Mánbhúm District, is situated the well-known Párasnáth hill. The physical character of this hill is a central narrow ridge, with many rocky peaks, irregular in shape, but taking the general configuration of a crescent, the extremities of which point to the north-east and north-north-west. In these directions the principal spurs of the hill extend, and the spurs are of the same narrow rocky character as the central ridge. The hill is devoid of any large spurs on the south-west, and on this side, where it is somewhat precipitous, the greatest continuous rise occurs, the general level of the surrounding country being lower. To the north and west the spurs are very extensive, and of a part with the Párasnáth upheaval; and extending as far as the Barákhar river there is a high country of a very rocky, broken character. To the south-east there is one spur of importance, which forms the boundary between the Districts of Hazáribágh and Mánbhúm; this spur extends through *parganá* Tundá of Mánbhúm, and resolves itself into a belt of high land from which several prominent peaked hills take their rise.

North of the Párasnáth system, which may be considered to extend as far as the Barákhar river, no hills of importance are met with until the face of the lower plateau is reached, which overlooks the Gayá plain. Looking from this edge to the south, a country gently undulating and fairly cultivated is seen, while to the north there appears a tract of rocky hills and steep ravines. This wild tract is not an entire waste, as here and there small patches of cultivable land and villages are met with; but the greater part is covered with jungle, and the slopes of the ravines are almost entirely devoid of cultivable soil. The central valley of the Sakri river is an excep-

tional feature in this tract; it contains much valuable rice-land and many prosperous villages. Near the boundary of Monghyr District the Ghoranji hill is a prominent object. From Ghoranji hill the Keul river takes its rise, and forms the boundary with Monghyr for a short distance. The District boundary then follows a short semicircular range, which terminates abruptly in a broad-featured hill, scarped on its northern face, named Sátpahri. It has an elevation of 1806 feet; while a Survey station on the banks of the Keul river, 4 miles north of the hill, records an elevation of only 548 feet. The northern scarp of Sátpahri is therefore elevated about 1200 feet above the plain of Monghyr. Sátpahri is a place of pilgrimage of local repute.

Beyond Sátpahri the Keul river breaks through the range by a narrow gorge, and the range then turns westward, and becomes the boundary with Gayá District. The most prominent part of the range is the Rheowá hill, height 1673 feet. The water basin of the Keul river is a minor feature; and the range from a short distance beyond the gorge of the Keul river is the northern watershed of the Sakri river basin. The eastern limit of the Sakri is a ridge neither elevated nor prominent, and partly cultivated, which separates its feeders from those of the Keul river. The southern watershed of the Sakri river is the elevated face already described; and on the west the feeders of the Sakri are confined by a northerly offshoot, which, with the exception of one sharply-peaked hill (Máramoko, height 2052 feet, rising from the ridge 5½ miles from the edge of the plateau), is of no prominence until it reaches its final limit in the Mahábar range. The last-mentioned range extends in a general direction east and west for 14 miles, and is crossed by the boundary of Gayá District at 5 miles from the eastern end. It has a very imposing appearance from the Sakri valley; the sides are steep, but not entirely scarped, and the top is undulating, with an average breadth of about a mile. The general elevation above the valley of the Sakri is 1600 feet, and the elevation above the sea of the eastern end, where the Survey station is fixed, is 2210 feet. A waterfall called Kokalhát, in height 90 feet, falls on the northern face of the range in the District of Gayá; the situation is very picturesque, and an annual fair is held on the spot in February.

The hill next in prominence to Mahábar within the Sakri water basin is the peaked hill Bhandeswar, a bare rock which shoots up abruptly from a wild uninhabited tract to the east of the central

valley. The hill is very difficult of ascent, and where the Survey station is fixed has an elevation of 1739 feet above the sea. A perpendicular rock, which could not be ascended, is about 20 feet higher. There are several other peaked hills of the same character as Bhandeswar in the neighbourhood.

Returning to the edge of the plateau which overlooks Gayá District, westward from the watershed of the Sakri river, two prominent peaks are met with, Nero, height 1737 feet, and Banda, height 1853 feet. The latter is a place of pilgrimage of local repute, and is also the subject of a mythical legend. Again, passing through the tract of rocky ravines which extend from the edge of the plateau to the lower level of the Gayá plain, a massive rocky hill, Durbásha, height 2209 feet, lies on the District boundary. Several hills of the same character, but of less prominence, are met with on proceeding westwards along the outer edge of this tract of rocky ravines; but none are worthy of remark until Lohárwar is reached, a broad-featured hill, height 1788 feet, which overlooks the Dhanwá Pass. This pass is that by which the Grand Trunk Road descends from the plateau to the Gayá plain; and it may here be noticed that during its course, in a distance of 7½ miles, the change of level is 737 feet. A Survey station at the top of the pass records an elevation of 1320 feet, and a second station on the parapet of a bridge one mile east from the Mohaní river shows an elevation of only 583 feet. A few miles west from the Dhanwá Pass, the Mohaní river leaves the plateau and passes through the tract of ravines. The extent of the ravines has now become much narrower, and the change of level more rapid. Still further westward the Dhangáin Pass is reached, by which the old Trunk Road to Sherghátí left the plateau for the lower level. This pass has fallen into disuse, and is now impracticable for wheeled traffic. A few miles beyond the Dhangáin Pass is Kulhua hill, a collection of rocky peaks, which stand somewhat in advance of the plateau, and overlook the valley of the Lilájan river. Kulhua is a place of local pilgrimage; and a small temple and a tank are found near the top of the hill. From this hill the face of the plateau trends southward as the Lilájan river with its feeders breaks through, again to advance after the river is passed, so as to form a narrow, well-cultivated valley, until, opposite to Kulhua hill, the river finally passes into the Gayá plain. But the table-land has now reached its western limit, and beyond the Lilájan river, though the highland takes partially the nature of a plateau, it is of limited extent, and

is little more than an elevated watershed between the feeders of the Lilájan and of the Morhar river. This ridge, turning southward, throws off as a westerly offshoot another more important watershed between the Morhar river and the Chákо river. The Chákо is a feeder of the Amánat river, itself a feeder of the Koel, which is one of the most important tributaries of the Són. The ridge, as the final limit of the lower plateau, in turn becomes the watershed between the Chákо and the Lilájan, and finally joins the higher and central plateau at its western extremity.

SCENERY OF PÁRASNÁTH HILL.—It may not be out of place here to supplement Major Sconce's scientific account of the topography of Párasnáth, by the descriptions of some of those travellers who have recorded their impressions of the scenery. The earliest visit of which I can find any mention is that of Colonel Franklin in 1819. He ascended the hill from the north by the pilgrim route, which starts from the small village of Madhuban.

"The ascent to the mountain commences by a narrow steep path surrounded by the thickest forest. As you ascend, the mountain presents a stupendous appearance; at intervals you perceive the summit of Párasnáth appearing in bluff jagged peaks, eight in number, and towering to the clouds. From an opening in the forest the view is inexpressibly grand, the wide extent of the Jungle Terry (*tarái*) appearing as if beneath your feet, and looking like the surface of a pictured landscape; the summit, emphatically termed by the Jains *Asmid Sikhar*, or the peak of bliss, is composed of a table-land, flanked by twenty small Jain temples, situate on the craggy peaks and in different parts of the mountain."

The name of the summit is misspelt. Wilson writes it *Samet Sikhar*, but gives no derivation. It would seem that Colonel Franklin's interpretation, "the peak of bliss," is the correct one, *samet* being possibly a local corruption of the Sanskrit *samad*, happiness. The next visitor was a Government officer, who ascended Párasnáth in November 1827, at the end of an official tour through the Fiscal Division of Kharakdihá, and published an account of his visit, signed with the initials A. P., in the *Calcutta Quarterly Magazine* for that year.

"All dák-travellers who have journeyed along the new Military Road to Benáres must be familiar with the name of this mountain; for they can scarcely have neglected to inquire the title of that remarkable line of hills which haunts them like a shadow from Bánkurá to Katkamsándi. Coming into view at the former place, it

grows in height and breadth until it appears frowning in front of the bungalow at Chás, at a distance of about thirty miles. From this place travelling westward, its numerous and craggy points slowly recede from view, until from the high ground at Hazáribágh it becomes a faint but picturesque outline, catching tints from the sky in front of the setting sun. From the telegraph on the top of Tutgi Ghát the mountain is seen in the most favourable manner; its broad base rises abruptly from the distant plain, and slopes gradually at the extreme sides, until the outline breaks into numerous peaks, that from the corner of the hill seem shooting their arrowy points at the heavens. From the plain to within a few yards of each pinnacle, and even in some of the pinnacles themselves, the mountain is thickly covered with magnificent trees, whose round heads take various tints from the changing seasons of the year, and even from the hourly variations of light between dawn and darkness."

The new Military Road of which A. P. speaks is the old Grand Trunk Road from Calcutta to Sherghátí *via* Bánkurá and Hazáribágh. It enters Hazáribágh at Mánápuri in *parganá* Golá, and leaves it by the Dhangáin Pass in *parganá* Kaindi, after traversing the District at an average distance of sixteen miles south-west of the Grand Trunk Road. This old road has entirely fallen out of use as a main line of communication. Small sections are here and there employed for local traffic between villages, but in many places any trace of the road can only be recognised with difficulty.

Dr Hooker, who ascended the hill in February 1848, writes thus of the view of Párasnáth from near Táldángá in Mánbhúm District:— "As the sun rose, Párasnáth appeared against the clear grey in the form of a beautiful broad cone, with a rugged peak of a deeper grey than the sky. It is a remarkably handsome mountain, sufficiently lofty to be imposing, rising out of an elevated country, the slope of which upward to the base of the mountain, though imperceptible, is really considerable; and it is surrounded by lesser hills of just sufficient elevation to set it off. The atmosphere, too, of these regions, is peculiarly favourable for views; it is very dry at this season; but still the hills are clearly defined, without the harsh outlines so characteristic of a moist air. The skies are bright, the sun powerful; and there is an almost imperceptible haze that seems to soften the landscape, and keeps every object in true perspective." On a subsequent page he describes the view from the hill itself. "The view from the saddle of the crest was beautiful, but the atmosphere too

hazy. To the north were ranges of low wooded hills, and the course of the Barákhar and Ajai rivers; to the south lay a flatter country with lower ranges, and the Dámodar river, its all but waterless bed snowy white from the exposed granite blocks with which its course is strewn. East and west the several sharp ridges of the mountain itself are seen; the western considerably the highest. Immediately below, the mountain flanks appear clothed with impenetrable forest, here and there interrupted by rocky eminences, while to the north the Grand Trunk Road shoots across the plains, like a white thread, as straight as an arrow, spanning here and there the beds of the mountain torrents."

I also quote from the same authority the following remarks on the botanical aspects of the hill:—"Though the botany of Párasnáth proved interesting, its elevation was not accompanied by such a change from the flora of its base as I had expected. This is no doubt due to its dry climate and sterile soil; characters which it shares with the extensive elevated area of which it forms a part, and upon which I could not detect above 300 species of plants during my journey. Yet that the atmosphere at the summit is more damp as well as cooler than at the base, is proved as well by observation as by the vegetation; and in some respects, as the increased proportion of ferns, additional epiphytal orchideous plants, Begonias, and other species showed, its top supported a more tropical flora than its base. The mountain top presents a mixture of the plants of a damp hot, a dry hot, and of a temperate climate, in fairly balanced proportions. The prime elements of a tropical flora were, however, wholly wanting on Párasnáth."

PÁRASNÁTH HILL AS A MILITARY SANITARIUM.—The first definite proposal to establish a convalescent depôt for European troops on Párasnáth hill was made in 1858, by Captain William Maxwell and Captain J. P. Beadle. The chief advantages of the spot were then stated to be the coolness of the climate, which ranges from ten to fifteen degrees below that of the plains, the superior freshness and purity of the air, the nearness of the spot to Calcutta, and the ease with which building materials could be obtained on the spot. The Lieutenant-Governor of Bengal, Sir Frederick J. Halliday, who had visited the hill in 1855, declined to recommend the proposition to the Supreme Government, believing that the space on the top was insufficient for building and for the recreation of European soldiers, and that the difference of temperature was too small to affect Euro-

peans requiring a change to a cool atmosphere. In 1859, Sir John Peter Grant became Lieutenant-Governor, and the proposal of a sanitarium on Párasnáth was revived. Major Maxwell had in the meantime revisited the hill, and reported that there would be no difficulty in finding room on the top for buildings to accommodate four or five hundred men, while many miles of level road could be constructed round the hill as a means of exercise and recreation. A further report on the same subject by Captain C. B. Young, officiating chief engineer, explained that the road up the hill on the south side could be improved and widened at little cost, and that a good supply of water was obtainable within easy reach of the summit. In consequence of these reports, the Commissioner of Chutiá Nágpur was directed to inquire into the ownership of the hill, and to inform Government on what terms land for building sites could be obtained, and what arrangements would be necessary so as not to interfere with pilgrims visiting the large temple near the summit. Inquiry elicited that one half of the range called Párasnáth hill belonged to the minor Rájá of Pálganj, then under the guardianship of his mother the Ráni; while the remaining was held in nearly equal shares by the *zamíndárs* of Jhariá, Nawágarh, and Katrás in Mánbhúm District. The three Mánbhúm *zamíndárs* declined to sell any of the land for money; but severally agreed to make a free gift of their shares to Government, on condition that the temple of Párasnáth was respected, the pilgrims in no way molested, and the forest and bamboos left at their disposal, or, if taken for building purposes, paid for. The Ráni of Pálganj at first objected, on the ground that it would be an act of sacrilege on her part to sell or give up any part of the sacred hill. Afterwards, however, she consented to cede any land that might be required, stipulating that the Jain pilgrims should be permitted to visit all the shrines on the hill as before, and that the temples themselves should not be violated. On the 29th of June 1860, the Government of Bengal reported to the Supreme Government the steps that had been taken in the matter; and mentioned that the chief engineer had been instructed to complete the road to the top of Párasnáth, and mark out the several building sites with a view to furnishing a correct and detailed plan. The entire proposal was approved by the Government of India. The Governor-General, however, was of opinion that the offer of the Ráni of Pálganj to transfer the ground as a free gift should not be accepted, but that a fair price in money or an exchange of land should be tendered to

her. This condition was communicated to the Commissioner of Chutiá Nágpur, who suggested that Government should authorise him to obtain from the proprietors a grant in perpetuity, at a reasonable quit-rent, of such portions of the hill as were required. In March 1861, the work of building a bungalow was stopped in consequence of orders received from the Secretary of State for India. In April of the same year the Lieutenant-Governor visited the hill, and at the conclusion of his visit pressed on the Supreme Government that the pleasant nature of the climate and the salubrity of Párasnáth had been placed beyond a doubt. He showed, from the comparative register, that the temperature averaged during the seven hot months of the year 16° lower than in the plains at Ránígánj. He therefore requested that orders might be issued for proceeding with the work, and completing a double bungalow with a barrack for thirty-three men. Estimates were accordingly prepared, the buildings were commenced in 1862, and Párasnáth was taken as a sanitarium by the military authorities, in addition to Dárjíling, for convalescents from Barrackpur, Barhampur, Dum-Dum, and Dinápur. In 1864 some invalids were sent to the hill, and nearly all of them, though reduced by disease, soon improved in appearance and gained weight. In 1865, twenty-nine men of the 54th Regiment remained at Párasnáth from April to November. The climate proved beneficial to them, and also to thirty-two men sent up in the following year, who were suffering from simple fever, rheumatism, or general debility. In June 1866, although many men suffered in that year from the buildings being leaky, the officiating principal Inspector-General of the Medical Department reported well on the results of the experiment; and in 1867, the buildings having been repaired, the report was still more favourable. Nearly all the men were stated to have improved in weight and appearance, owing to the cool climate and the freedom from hot air and insects.

In 1868, however, Párasnáth was given up as a military sanitarium, on the grounds that there was not a sufficient supply of water for more than sixty or eighty men, that the space was too confined to allow invalids proper exercise, and that the spot was too quiet, and exercised a depressing influence on the spirits of European soldiers. The medical returns were adverse to the scheme, except for patients only slightly ill; and the expense of establishing a permanent hospital with its regular staff was thought to counterbalance the advantages of the place. Accordingly, in January of that year the buildings on

Párasnáth, consisting of a double bungalow for officers and a barrack for thirty-two men, with offices and storehouses, erected at a cost of more than Rs. 80,000, were made over to the Public Works Department.

RIVER SYSTEM.—From the central position of the District of Hazáribágh in reference to the several river systems of Western Bengal, and from the elevated character of the surface of the District, it will readily be understood that the drainage is shared by many rivers. The most important geographical watershed is that which separates the waters of the Dámodar river and its affluent, the Barákhar, from the streams which flow northward to join the Ganges. Tracing this line of watershed from the west between the feeders of the Dámodar and those of the Mohaní, it first follows the western limit of the central plateau, and then crosses the plateau, continuing to separate the feeders of the Barákhar from the Mohaní, and following a low undulation in a cultivated country. This undulation then connects itself with the elevated face of the lower plateau, which has already been described as the well-defined watershed of the Barákhar river basin. This watershed of separation from the affluents of the Ganges extends as far as the eastern boundary of the District; the Ganges watershed then passes out of the District, and the Barákhar river basin has a common watershed with the Ajai and its tributaries. The term "basin" is peculiarly applicable to the country drained by the northern feeders of the Barákhar river. The elevated lip follows a crescent-like line of great regularity for nearly 100 miles, and the undulations to the river are singularly regular, so few are the disturbing features which intervene to break the uniformity of the gradient. The area which is divided by the watershed, as described above, assigns a drainage area in Hazáribágh District to the Dámodar and its tributaries of 4530 square miles, or nearly two-thirds of the whole area of the District.

THE DÁMODAR.—Hazáribágh may be said to contain a section of the valley of the Dámodar river of about 90 miles in length; and in this section the river receives a large addition to its volume from several important feeders. The watershed of this section does not lie entirely within Hazáribágh District, but very nearly so, and there is only one important feeder which breaks from the Chutiá Nágpur plateau after taking its rise within that District. When meeting the District on the south-west, the Dámodar has already run through a course of about 25 miles in *parganá* Tori of Chutiá Nágpur; it then forms

for a short distance the boundary between the two Districts, and the first feeder which it receives from the Hazáribágh side is the Garhi, which descends from the western limit of the central plateau. Shortly afterwards the Haharo comes in, which, with several feeders, also takes its rise on the face of the plateau, and drains the greater part of the Karanpurá valley. Then follows the Naikárí from the south, taking its rise on the plateau of Chutiá Nágpur, the Mara-marhá from the north, the Bherá from the south, and numerous smaller streams from both sides. The next and most important is the Kunar, which before joining the Dámodar has itself received as large tributaries the Bokáro and Siwáni, besides many minor streams which receive the drainage of a large area. The Kunar and the Siwáni share between them the drainage of the eastern portion of the central plateau, and unite to break through the elevated lip of the basin-like formation in one narrow gorge. The Bokáro takes its rise in the southern face of the plateau, but soon leaves it to skirt the southern face, and to pass by a narrow and picturesque valley between the opposing hills Jilingá and Lugu. After running for a short distance parallel to the Dámodar, it joins the Kunar, 4 miles above the junction of that river with the Dámodar. To the west of Lugu hill many surface seams of coal are visible in the bed of the Bokáro and its feeders; the extent of the deposits has been partially examined, and is known as the Bokáro Coal Field. On the north bank of the Dámodar, below the junction of the Kunar, seams of coal are also visible, but the quality of the mineral is believed to be inferior to that of the Bokáro Coal Field. After the Kunar the Dámodar receives from the south the Khanjo; and last from the north, on the boundary of Mánbhúm District, the Jamuniá, a very large and important tributary. The elevations which have been determined on the banks of the Dámodar are worthy of notice. Shortly after entering the District, and where it is joined by the Garhi river, a Survey station on the banks of this river shows an elevation of 1326 feet. After a course of 38 miles, at the point where the highroad from Hazáribágh to Ránchí crosses the river, the elevation is recorded as 1030 feet, showing a fall of 8·8 feet per mile. After a second course of 35 miles, the elevation at the junction of the Kunar is 713 feet, showing a fall of 9·0 feet per mile; and after a final course of 20 miles, the elevation at the junction of the Jamúniá, where the river leaves the District, is 582 feet, showing a fall of 6·5 feet per mile. The Dámodar river tra-

verses Mánbhúm, Bánkurá, Bardwán, and Húglí Districts, and eventually joins the Húglí river below Calcutta.

The Dámodar is everywhere fordable during the dry season. During the rains the river is not navigable, but rafts of timber are frequently floated down to the lower Districts during that season. Dugdá, at the junction of the Jamuniá, after all the rocks and rapids are passed, is the point where these rafts are usually prepared. The total area of Hazáribágh District which is drained by the Dámodar river and its tributaries is 2480 square miles.

THE BARÁKHAR river has its rise on the north face of the central plateau, first taking a northerly course as far as the Grand Trunk Road, where it is crossed by a masonry bridge. It then turns eastwards, but soon assumes a general south-easterly course, which it continues until it leaves the District to form the boundary between Mánbhúm District and *parganá* Deogarh of Bírbhúm. The Barákhar unites with the Dámodar on the boundary of Bardwán and Mánbhúm Districts, about 32 miles after it has left the Hazáribágh frontier, and 3 miles below where it is crossed by an iron girder bridge on the Grand Trunk Road. It is everywhere fordable during the dry season. During the rains this river is remarkable for the suddenness with which it rises, and for the strength of its current: after continued rain it may be impassable for several days. A Survey station on the bank of the Barákhar, 4 miles above where the highroad from Hazáribágh to Girídi railway station crosses, records an elevation above the sea of 795 feet; and another station, 17 miles farther up the stream, records an elevation of 907 feet, showing for this short section an average fall of 6·6 feet per mile. The total area of the Barákhar river basin in Hazáribágh is 2050 square miles.

The river basins next in importance are those of the Mohaní, Lilájan, and Morhar, which drain the north-western portion of the District. The Mohaní and the Lilájan unite in Gayá District about 21 miles from the Hazáribágh boundary, and 6 miles south of the town of Gayá, to continue their course together towards the Ganges as the Phálgu river. The Morhar holds a distinct course through Gayá, and preserves its own name almost until it finally joins the Ganges in the District of Patná. The Mohaní and Morhar have rocky beds, and are almost dry except during the rainy season. The Lilájan partakes of the same character until it leaves the plateau, after which it has a broad sandy bed. The Mohaní river

basin has an area in Hazáribágh of 490 square miles; the Lilájan, 380 square miles; and the Morhar, 170 square miles.

South and west from the watersheds of the Lilájan and Morhar rivers are the smaller basins of the Jhikiá and Chako; these join in *parganá* Palánau of Lohárdagá District to form the Amánat river, an affluent of the Koel, which is one of the most important tributaries of the Són river. The Jhikiá and Chako rivers, considered as one river basin, drain in Hazáribágh an area of 170 square miles.

From where the Mohaní river leaves the lower plateau, following the watershed of the Barákar basin eastward, the first northerly stream of importance is the Dhádhár; then comes the Tileyá; and lastly the Dhánarjí. These three streams belong to a distinct system of drainage; the Tileyá and the Dhánarjí first unite, and the final junction with the Dhádhár is in Gayá District, about 26 miles from the Hazáribágh boundary. They then flow as one stream past the town of Behar, to join the Ganges in the District of Patná. The area of Hazáribágh which is drained by the Dhádhár, Tileyá, and Dhánarjí is 200 square miles.

The next is the SAKRI river, with a compact water basin of its own. The Sakri itself is the central stream in a low, well-cultivated valley, and it receives from all sides numerous feeders, which penetrate from among the surrounding rocky ridges. The Sakri has still a distinct water system, and preserves its own name while it advances through Gayá District towards the Ganges. In Hazáribágh District the drainage basin of the Sakri is 810 square miles. The Keul has a small water basin, in area 70 square miles, north-east of the Sakri basin, but not touching the Barákhar watershed. The Keul preserves its own name, after being joined by many large feeders, while traversing Monghyr; in which District its course entirely lies until it joins the Ganges. Leaving the Sakri basin, the next stream having a common watershed with the affluents of the Barákhar is the Barnar, a minor tributary of the Keul, which it joins in Monghyr District about 21 miles after crossing the District boundary. The Barnar drains 50 square miles of Hazáribágh.

After the Barnar, along the same watershed, the sources of the Ajai commence. The Ajai itself merely takes its rise on the boundary, without draining any portion of the District area. But two tributaries of the Ajai penetrate the District—first, the Patro, and then the Jainti, which, after draining an area in Hazáribágh of 100 square

miles, join the Ajai in *parganá* Deogarh of Bírbhúm District, at nearly the same point, 20 miles from the Hazáribágh boundary. The Ajai, after traversing Bírbhúm and Bardwán Districts, eventually joins the Húglí river between Murshidábád and Krishnagar. Beyond the Jainti, the watershed of the Barákar river passes into Bírbhúm.

Passing to the south of the basin of the Dámodar river and to the south-eastern extremity of the District, the sources of the Kásái river flow from the ridge of a lofty range of hills called Jabar or Bhaski, from the names of villages at its base, which forms the boundary of Mánbhúm District. The Kásái, after traversing Mánbhúm and Midnapur Districts, joins the Haldí river, about 20 miles above the point where that river joins the Húglí, opposite to the northern extremity of Ságar island. West from the Kásái watershed, an area of 50 square miles is drained by several small feeders of the Subarnarekhá river, and the river itself forms the District boundary of Chutiá Nágpur for about 15 miles. The Subarnarekhá river traverses Chutiá Nágpur, Mánbhúm, and Singbhúm Districts, generally forming a District boundary. It then passes into the Tributary State of Morbhanj; and leaving Morbhanj to traverse Midnapur and Balasor Districts, falls in the latter District into the Bay of Bengal.

STATEMENT OF THE AREAS DRAINED BY THE RIVERS AND RIVER SYSTEMS IN HAZÁRIBÁGH DISTRICT.

System.	River	River drainage sq. miles.	System drainage sq miles
Dámodar.	Dámodar.	2480	4530
	Barákhar.	2050	
Ganges.	Mohaní.	490	...
	Lulájan.	380	...
	Morhar.	170	...
	Dhádhár, Tileyá, and Dhánarjí	200	2170
	Sakri.	810	...
	Keul.	70	...
	Barnar.	50	...
Són.	Jhikiá Chako.	170	170
Ajai.	Patro, Jainti	100	100
Subarnarekhá.	Subarnarekhá.	50	50
Total area,			7020

For the foregoing account of the Hill and River Systems of Hazáribágh, I am indebted to the kindness of Major J. Sconce, who

conducted the Topographical Survey of the District in seasons 1868–71.

THE BANKS OF THE RIVERS in Hazáribágh District conform as a rule to one of the following types:—Terraces of sandy or alluvial soil, faced here and there with rocky ledges, and overgrown by low jungle; or steep cliffs of hard gravelly earth, furrowed into countless small channels by the discharge of surface drainage. With few exceptions, the beds of the streams are sandy. Ordinarily, therefore, no cultivation is possible on the banks or in the bed of the stream. Where, however, the banks happen to be low, land at the river edge is cultivated at a profit, and assessed under the name of *tarí* at Rs.2-8-0 per *bighá*. The name *tarrí* appears to be a corruption of *tírí*, from Sanskrit *tír*, a bank. Such land can be irrigated by means of a lift during the rains and the early part of the cold weather, and is planted with wheat, barley, sugar-cane, opium, tobacco, and *kandá*, used for *tarkáris* or vegetable curries. It is usually manured, but yields only a single crop, as cultivation is confined to that period of the year when the water is within reach. In special localities, small plots in the bed of the stream are taken into cultivation from September to March for wheat and barley only. These lands are assessed as ordinary *tarrí*.

BOATS.—Owing to the peculiar violence and uncertainty of the river currents, no ordinary form of boat is in general use in the District. The only substitute is a species of float called *gharnáo*, which consists of nine earthen pots (*gharás*) arranged in rows of three, the mouth of each *gharí* being closed by a cover of *sál* leaves. Over these is lashed a stout bamboo framework of about three feet square. The machine is propelled by men, generally of the Málá caste, who swim along with it, and gradually work it across the stream. During the rainy season, Málás are stationed wherever the postal line of road crosses an unbridged river, and the mails are regularly taken across on a *gharnáo*. On an emergency, this machine can even be made to carry a palanquin.

RIVER-SIDE TOWNS.—There are no towns or villages in Hazáribágh District the population of which lives exclusively by river traffic. A few persons find employment during the rains in floating timber down the Dámodar river to Ráníganj and Bardwán, and a similar traffic is said to be pursued on the Barákhar and Lilájan rivers. The bulk of the timber, however, that leaves the District is exported on

sagar or solid wheeled carts, and the floating trade is comparatively unimportant.

UTILISATION OF THE WATER SUPPLY.—No use has at present been made of the rivers as a motive power for machinery. I am informed that there are many places where the water power might be so utilised; but European enterprise is as yet new to the District, and the native landholders are too ignorant and prejudiced to attempt any scheme of the kind. The various modes of applying water to irrigation will be noticed on a subsequent page.

FISHERIES.—There are no regular fisheries or fishing-towns in the District, but near Baihí and on the Barákhar and Dámodar rivers a small local trade in fish is carried on. No rent is paid for the right to fish.

PASTURAGE GROUNDS.—The uncultivated high lands of the south and south-west of the District contain fine stretches of grazing ground for cattle. During the cold weather large herds are driven in for pasture from the neighbouring District of Gayá, where grazing land is scarce.

FERÆ NATURÆ.—Tigers abound in the less cultivated parts of the District, and destroy large numbers of cattle during the year. The low conical hills with which the surface of the District is dotted afford a fine refuge for bears and leopards; and the *soná chitá*, or dog-leopard, distinguished by non-retractile claws, is occasionally found. Wolves are very common, and wild dogs hunt in packs on Párasnáth hill. During the eight years from 1862 to 1869 inclusive, the average number of animals destroyed was as follows:—Tigers, 35; leopards, 45; bears, 26; wolves, 30. The total sum paid in the way of rewards was Rs.11,390-2-8, showing an average payment of Rs.1423-12-4 or £142, 7s. 6½d. per annum. Within the same period the number of persons killed by wild beasts amounted to 1004, or an average of 125 per annum. It is further probable that many cases were not reported. No trade exists in wild beasts' skins, nor is any revenue derived from the *feræ naturæ*. No rewards are paid for destroying snakes, and returns of the number of deaths by snake-bite for an extended period are not available. The Police reports for 1874 show the deaths by snake-bite in that year as 65. Several varieties of deer are found in the jungles, the *sámbhar* or red deer, the *chitál* or spotted deer, the hog-deer, the *kotárá* or four-horn deer, the ravine-deer, the *nilgái* or *rojh*, and the *kakar* or barking-deer. *Gaur* or bison are occasionally met with, though they are now

becoming scarce. Of game birds, there are the jungle-fowl, pea-fowl, the black, grey, painted, and double-spurred partridge, field and bush quail, duck and teal in great numbers and variety, snipe, ortolan, plover, florican, *hariál* or green wood pigeon, and curlew.

Mineral Springs.—There are no fewer than five groups of mineral springs in Hazáribágh District. Dr Hooker (*Himálayan Journals*, vol. i. chap. ii.) thus describes a spring which he examined at Belkapí or Surajkund near Barkattá, on the Grand Trunk Road:—"The hot springs (called Surajkund) are situated close to the road, near the mouth of a valley, in a remarkably pretty spot. They are, of course, objects of worship, and a ruined temple stands close behind them, with three very conspicuous trees—a *pipál*, a banyan, and a white, thick-stemmed, leafless *Sterculia*, whose branches bore dense clusters of greenish fœtid flowers. The hot springs are four in number, and rise in as many ruined brick tanks about two yards across. Another tank, fed by a cold spring, about twice that size, flows between two of the hot, only two or three paces distant from one of the latter on either hand. All burst through the gneiss rocks, meet in one stream after a few yards, and are conducted by bricked canals to a pool of cold water about eighty yards off. The temperatures of the hot springs are respectively 169°, 170,° and 190°; of the cold, 84° at 4 P.M., and 75° at 7 A.M. the following morning. The hottest is the middle of the five. The water of the cold spring is sweet, but not good, and emits gaseous bubbles; it was covered with a green floating *conferva*. Of the four hot springs, the most copious is about three feet deep, bubbles constantly, boils eggs, and though brilliantly clear, has an exceedingly nauseous taste. This and the other warm ones cover the bricks and surrounding rocks with a thick incrustation of salt. *Confervæ* abound in the warm stream from the springs; and two species, one ochreous brown and the other green, occur on the margins of the tanks themselves and in the hottest water; the brown is the best salamander, and forms a belt in deeper water than the green; both appear in broad luxuriant strata, wherever the temperature is cooled down to 160°, and as low as 90°. Of flowering plants, three showed in an eminent degree a constitution capable of resisting the heat, if not a predilection for it; these were all *Cyperaceæ*; a *Cyperus* and an *Eleocharis* having their roots in water of 100°, and where they are probably exposed to greater heat; a *Fimbristylis* at 98°; all were very luxuriant."

A second spring is found at Doarí on the Mahaní river, with a temperature of 110° Fahr. I quote the following account of two other mineral springs from a Revenue Survey Report by Captain E. W. Samuells :—"The spring of Indra Jarbá is situated at the foot of the Hazáribágh plateau, twelve miles to the south of Hazáribágh, and about a mile to the east of the road from Hazáribágh to Ránchí. The nearest village is Indra, two miles to the west. From the sandy bed of a small *nálá* which flows into the Bokáro *nadí*, and over a space about fifty yards in length, springs rise in three places; the water is brackish, and leaves a slimy white deposit on the sand. A good deal of sulphuretted hydrogen gas comes bubbling up through the water at intervals. Cattle are very fond of the water, and the natives bathe in it for the cure of skin diseases, but do not drink it. The temperature of the spring is 102° Fahr.

"The Gandhammias spring is about a mile north-west of the village of Kankí; temperature 92°. It is situated at the south end of the Sorangá *ghát*, close to the road leading from Bádam to Rámgarh, and on the left bank of the Gandhammia *nadí*. About sixty yards down the same bank of the *nádí*, from under a block of gneiss rises another spring, of the same temperature as the other. The water leaves a white deposit on the rocks, and is almost tasteless, but smells of sulphuretted hydrogen. Cattle drink it, and the natives worship the spot as the residence of a deity; they also use the water outwardly in the treatment of skin diseases. The native belief is, that long ago, when the road through the Sorangá *ghát* was more used than it is now, a large caravan of merchants travelling with pack-bullocks once halted on the banks of this *nálá*; at the same time an ugly old woman passing by came and asked for alms, which were refused her, so she went farther on to where another caravan was encamped, the members of which proved more charitable, and gave her something. Out of gratitude for this she advised them to place the packs on their bullocks and march on at once, as something dreadful was about to happen. They therefore followed the old hag's advice, but had no sooner departed than the earth opened and swallowed up those who remained, bullocks, packs and all; some few managed to escape, and fled to a hill about two miles off, but when they halted, the earth opened and swallowed them up also. In this way the natives account for the hot springs which rise in both places and mark the spots where the members of the caravan were entombed."

The mineral spring of Kesodih, in *parganá* Kharakdihá, about fifteen miles south of Dhanwár, is a pool ten yards long by about three yards broad, situated in the middle of some rice-fields. In some places the water wells out from fissures in the rocks, which here come to the surface, and in others bubbles up through the mud. The temperature is 182° Fahr. The water tastes and smells of sulphur, and has coloured the weeds growing in the pool a bright orange and green. The place is considered sacred, because the dry portions of the rock, being largely marked with *sindur* or vermilion, have become the home of resident Bráhmans.

Forests.—Although the face of the country is to a large extent covered with jungle, there are no forests in Hazáribágh which contain timber of appreciable commercial value. The following extract from the Report of the Geological Survey for 1848–49 enumerates the chief timber-trees of the District, and explains the reasons why no trees are allowed to grow to a large size:—"The valuable timber trees met with in the course of the survey were the following:—*Pentaptera glabra.*—This is common in the hilly and mountainous tracts between Gidhaur and Kharakdihá, and also in the Kharakpur and Rájmahal hills; but it is doubtful if it occurs to a sufficient extent for the supply of any great or general demand for timber. Fine trees were occasionally seen, of fifteen inches to two feet in diameter; always solitary, never forming forests, and nowhere more frequently than nine or ten to the square mile. The timber is strong and durable, and is greatly prized for boat-building. *Conocarpus latifolius.*—This, which is a small tree in Hazáribágh District, attains a much larger growth in the mountainous and hilly country between Kharakdihá and Gidhaur, and still improves in size in the Kharakpur, and more especially in the Rájmahal hills, where it becomes a fine timber-tree, and is highly valued for all purposes which require strength and durability. *Diospyros ramiflora.*—This tree is common in *parganá* Kharakdihá, where it is of small size, the trunk not exceeding ten inches in diameter. It also extends from thence to the Kharakpur and the Rájmahal hills; in the latter it attains a larger girth. It is in general use in those Districts for cart-wheels. The berries, which are large, are eaten when ripe, although even then they are highly astringent. *Shorea robusta.*—This tree, which affords *sál* timber, is extensively grown throughout the hilly tracts of Birbhúm and Kharakdihá, the climate as well as the soil being adapted to its rapid growth and full development. The young trees are, however, in

such general request for house-posts, rafters, ploughs, boat-masts, &c., as never to be allowed to exceed the size required for these and other similar light purposes, for which alone the tree is grown, and extensively cultivated. The use of the saw being quite unknown in these Districts, it follows that if the tree is allowed to exceed a certain size (which is rarely the case) it must necessarily become quite useless. The only implement of the carpenter's art here known is the axe; consequently the labour of reducing a large tree to useful dimensions by such imperfect means would be more than the object is worth. The practice, therefore, is to encourage only the growth of suckers or saplings, extensive groves of which may be seen spreading over large tracts of country, so that the casual observer would be apt to refer the insignificant size of these *sáls* to natural causes—the unsuitableness of the soil or climate. Hence we have an example of the manner in which the social condition of a people, under peculiar circumstances, may affect the most important resources of a country. The absence of rivers capable of floating rafts, the want of roads and all means of transit but pack-bullocks alone, are other causes which have operated against the growth of timber in these Districts, for which they are naturally well adapted, as proved by the following circumstance. It was observed, in the vicinity of places where there is sufficient local demand for timber of better dimensions, that its size increases in proportion to the age of the forest. An occasional large *sál*, accidentally allowed to outgrow its usual dimensions, is often also met with. I measured a tree of this kind near a village about two miles south-east of Kharakdihá, and found it to be upwards of five feet in diameter, and to ascend to an elevation of thirty feet without a branch; thus proving the capabilities of these Districts for the production of fine timber, if the trees were allowed to attain a proper size. This question is so far important, that if a hint were communicated to the *zamíndárs* along the line of country where timber is likely to be required in these Districts, to allow every fiftieth tree to stand, in the course of a few years sufficient supplies of timber might be procurable for any public works that may hereafter be undertaken, without, perhaps, materially lessening the returns to be derived by the *zamíndárs* from the sale of spars. It is hard to believe the depth of jungle to which the woodcutters penetrate for young *sál*, and the difficult passes over which it is carried, proving at once the great demand in which it is held, and the hopelessness of obtaining full-grown timber in the interior unless some measure of conservation be

adopted. *Bambusa spinosa.*—I may here mention, that the tall, light bamboo, so common in Bengal and the plains, is quite unknown here; in place of it, the young *sál* serves as a substitute. There is, however, a small, hard, and solid bamboo, which is extensively planted, particularly in the hilly tracts of Bhágalpur. This bamboo is also indigenous to the Kharakpur and Kharakdihá hills, and is sought for, like *sál*, in the deepest forests during the months of January and February, when the jungles become safe. It is too small and heavy for scaffolding, or any of those purposes for which the larger and lighter bamboos of the plains answer so admirably. It is therefore used chiefly for laths, lattice-work, baskets, *banghis*, and other purposes for which strength and elasticity are required, and is for such purposes a very superior material."

In March 1873, the south-western portion of Hazáribágh District was visited by Dr Schlich, Conservator of Forests, who reported as follows:—"The geological formation as well as the forests of Hazáribágh resemble those of the southern half of Palámau. The upper hill ranges consist chiefly of gneiss, and on the undulating ground the surface consists of ferruginous loam and clay. Upper mixed forests cover the hill ranges and steep slopes, and *sál* forest the undulating ground. Of lower mixed forest I have seen very little, which is explained by the fact that Hazáribágh District may be said, generally speaking, to be situated at an elevation of about 2000 feet above the sea. The chief object of my short tour through this District, was to obtain some information regarding the question whether *sál* will grow large in it. The forests of *sál* consist throughout of shoots from old stumps, which are constantly cut as soon as they are fit for local purposes. Moreover, the people burn almost nothing but young *sál* shoots a few inches in circumference. In some places, on tracts of limited extent, the shoots are allowed to reach a somewhat larger girth, and whenever such is the case, they grow up into promising young trees; but even in these cases they fall under the axe before they reach a girth of three feet.

"The above data show that it rests entirely with us to produce large *sál* timber in Hazáribágh District. The present forests consist all of shoots from old stocks, and the absence of seedlings is due to the absence of seed-giving trees. It is true that *sál* begins very early to flower, but I believe that the seed produced by very young trees is not capable of germinating—a circumstance common to most timber-trees."

No revenue accrues to Government from any of the forests in the District. The Rájá of Rámgarh levies dues on the wood and other jungle products that are exported from his estate at the following rates:—On each beam, eight ánnás; railway sleeper, three and a quarter ánnás; *golá* or round unhewn trunk, two ánnás; *balli* or small tree rafter, two ánnás; cartload of bamboos or small wood, four ánnás. Two ánnás in the rupee is charged on the value of lac, resin, barks, grass, &c.

JUNGLE PRODUCTS.—The following account of the jungle products of Hazáribágh District is quoted from a paper by Mr V. Ball, of the Geological Survey, in the *Journal of the Asiatic Society*, No. II., 1867. It is applicable to both Hazáribágh and Mánbhúm Districts:—

"It is perhaps not generally known that throughout Mánbhúm and Hazáribágh, as well as in many of the adjoining Districts, a considerable number of the poorer classes of the people depend solely upon the jungle, to supply them with the means of subsistence for from two to three months of every year. In time of famine the number so dependent is, of course, greatly increased. In some of the more jungly parts of these Districts, where the cultivation round the villages is very limited and deficient, nearly the whole of the inhabitants who have survived the past famine can have had little else but the roots and fruits of the surrounding jungle upon which to subsist. While passing through some of these villages last season, I was told that but few deaths had occurred in them. On the whole, I am inclined to believe that people living in such villages are more independent, and less affected in every way by famine, than those who reside in the centre of cultivation, and have no jungle readily accessible. Were a census to be taken, it would probably be found that the relative proportion of deserted houses and villages, the result of the famine, to those still inhabited, would be much greater in the open cultivated parts of the District than in the dense jungles. Indeed, the jungles may be regarded to a certain extent as the saving of the lower races of the population. Did they not afford nutritious food in abundance, the result of a famine like that of 1866–67 would probably be not merely decimation, but utter depopulation throughout extensive areas. It is not to be supposed that even those who are in the habit of using this description of food regularly, for a greater or less portion of every year, regard it as in any degree an equivalent to rice. Many have spoken to me of eat-

ing *mahuá*, which is by far the best of these products, as being only better than suffering from absolute famine; and they always consider themselves legitimate objects of charity when they can say they are living on *mahuá* alone. The species mentioned are, of course, of varying importance, some being merely edible, and in a few cases injurious if eaten in large quantities; while others, as the *mahuá*, *sál*, *baer*, *bar*, *pipal*, *singárá*, *chehur*, various roots of the species of Dioscorea, and many of the varieties of *ság* (leaves), may be considered as *bonâ fide* staple articles of food.

"Bassia Latifòlia, Roxb., *Mahuá*, Hind. and Beng. In the Districts of Mánbhúm and Hazáribágh, *mahuá* groves, as well as stray trees in the jungle, are on the whole abundant. All the trees, with the exception of a few in the neighbourhood of roads, are the property of the *zamíndárs*, and are rented out by them at prices varying chiefly with the *bázár nirik*, or price of rice. As the crop of *mahuá* approaches ripeness, the corollas, becoming fleshy and turgid with secreted juices, gradually loosen their adhesion to the calyx, and fall to the ground in a snowy shower. The duty of collecting the fallen blossoms is chiefly performed by women and children; at dawn they may be seen leaving their villages with empty baskets, and a supply of water for the day's use. Before the crop has commenced to fall, they take the precaution to burn away the grass and leaves at the foot of the tree, so that none of the blossoms may be hidden when they fall. The gleaners generally remain under the trees all day, alternately sleeping and collecting the crop; the male members of the family, visiting the trees once or twice during the day, bear off the produce in *banghis*. It often happens that the people who collect come from a considerable distance, in which case they erect with the branches of *sál* a temporary encampment of huts, in which they live until the crop is all gathered in. In front of each of these huts a piece of ground is made quite smooth and hard, for the purpose of spreading out the flowers to dry. When perfectly dry, the blossoms have a reddish-brown colour, having lost three-fourths of their original dimensions, and about half their original weight. It is the custom with some of the natives, before spreading them out to dry, to pull off the little ring of foliaceous lobes which crowns the fleshy corolla. It is very difficult to collect trustworthy statistics regarding the amount of yield of the *mahuá* trees. I have been told, and it has been repeated to me several times,

that a first-class tree will yield as much as thirty *kachchá maunds* of twelve *chhatáks* to the *ser*, or about six-sevenths of a ton; in other words, an average daily fall of two *maunds* is said to continue for fifteen days. This estimate I believe is more than double the real facts. The rent of the trees varies much, according to their abundance in the District, the quality of the previous rice crop, and various other circumstances affecting the demand and supply. In parts of Hazáribágh, I have known ten small trees to be let for a rupee, while a single fine large one would sometimes bring the same amount. In Mánbhúm, I have been pointed out trees for which a sum of from two to three rupees was charged, but I have also heard of trees being hired in the same District for four ánnás. The saved crop also varies very much in price, the limits being, as far as I can ascertain, from two to eight *maunds* for the rupee; but when, as is perhaps most frequently the case, the exchange is in kind, the *mahájans* only give a small quantity of salt and three or four *sers* of rice for a *maund* of *mahuá*. In parts of Mánbhúm, I have been told that during the famine the price of *mahuá* was from twelve to twenty *sers* for the rupee. Two *maunds* of *mahuá* are stated by some to furnish a month's food to a family consisting of a father, mother, and three children. It is, however, seldom eaten alone, being much more frequently mixed with the seeds of *sál*, or with some of the leaves of the plants mentioned in the accompanying list, which are collectively called *ság*. The cooking is performed as follows:—The *sál* seeds, having been previously well dried in the sun, are roasted and then boiled alone; the *mahuá* flowers are then also boiled, and the water is thrown away. So far having been cooked separately, they are then mixed and re-heated; sometimes a small quantity of rice is added. It is the custom to cook but once a day, and each member of the family helps himself whenever he feels hungry. When fresh, the *mahuá* has a peculiar luscious taste, with an odour somewhat suggestive of mice; when dried, it possesses some resemblance to the inferior kinds of figs. Cooking renders it vapid and utterly devoid of flavour. On distillation, the newly-dried flowers yield a highly intoxicating spirit called *dárú*; this, before being sold, is diluted with ten times its quantity of water, and is then sold at the rate of two *pice* for about a quart.

"Shorea Robusta, Roxb., *Sál*, Hind. and Beng. Under the head of *mahuá*, the seed of this tree has already been alluded to. Where possible, the *mahuá* and *sál* are mixed in the manner above

described, but in some places even *mahuá* is not to be obtained, so that the *sál* seeds are roasted and eaten alone. With many of the Santáls, *sál* is probably a regular article of food, and not merely a *dernier ressort* to be used in time of famine.—Ficus Indica, Roxb., *Bar*, Beng. and Hind.; F. religiosa, Linn., *Pípál*, Beng. and Hind. The figs of both these species, especially those of the former, are eaten every year by the poorer classes of natives.—Zizyphus jujuba, Linn., *Baer*, Beng. and Hind. The fruit of this tree, though not at all to be compared in importance with *mahuá* as an article of food, is nevertheless much used in parts of these Districts where *mahuá* is not abundant. It may frequently be seen spread out to dry on the roofs of cottages. There are two varieties, at least, of *baer*. One is a small bush, with the appearance of which few who have travelled in India can fail to be familiar; the other is from the original stock, but has been vastly improved by cultivation, and is always found near villages. This fruit is sold in the *bázárs*, and when not quite ripe, has the pleasant acidity of an apple.—Bauhinia Vahlii, W. and A., *Chehur*, Beng. and Hind. The pods of this gigantic creeper, which, passing from tree to tree, forms the festoons peculiar to tropical jungle scenery, are most eagerly sought for by the natives; so much so, indeed, that it was with difficulty that I succeeded in obtaining botanical specimens. They are plucked just before they become ripe, so that in order to open them it is necessary to place them in a fire; on being sufficiently heated, they open with a loud report, and the carpels at once twist into curls, which no amount of pressure can remove. The seeds are easily detached, and are eaten at once.—Trapa bispinosa, Roxb., and T. quadrispinosa, Roxb., *Singhárá*, Beng. and Hind., *Panboie*, Santálí. Both these species of *singhárá* are well known to many Europeans. With the natives they form a favourite article of food. I have frequently seen from twenty to thirty persons, men, women, and children, groping in a half dried-up tank for *singhárá*, Paludinas, and small sluggish fish, which latter are caught by dragging on shore the weed in which they lie concealed. From the produce of a morning's collection of these miscellaneous substances a *tarkárí* is made, which is, perhaps, the only food upon which a family have to subsist for the day."

In the following list the species are arranged under headings indicating the part of the plant used, and in an order which is approximately that of their relative importance.

"SEEDS.—Shorea robusta, Roxb., *Sál*, Beng. and Hind. Much

used by the Santáls; occasionally roasted and eaten alone, but more frequently boiled with the dried flowers of *Mahuá*.—Bauhinia Vahlii, W. and A., *Chelúr*, Beng. and Hind. Sometimes stored, but more frequently roasted and eaten close to the spot where found.—Mucuna imbricata, D. C., *Kasí*, Beng.; M. prurita, Hook., *Alkusá*, Beng., *Kiwách*, Hind.; M. nivea, Buch. Sometimes cultivated.—Terminalia belerica, Roxb., *Bhera* or *Borá*, Beng. Kernels, if eaten in excessive quantity, are said to produce intoxication.—Terminalia catappa, Linn., *Bádám*, Beng. and Hind. Seeds used as a substitute for almond.—Fuirena ciliaris, R. Br., *Bandkabi*, Beng. and Hind. Seeds of this are used as a sort of meal, and are probably sometimes ground into flour before use.—Cassia fistula, Linn., *Bándarlári*, Beng., *Amultas*, Hind. Placentæ between the seeds used to make *sarbart*.—Ventilago calyculata. Seeds eaten in the same way as those of *Sál*.—Nelumbium speciosum, Willd., *Padma mólám*, Beng., *Banserá*, Hind.

"FRUITS.—Bassia latifolia, Roxb., *Maul* or *Mahuá*, Beng. and Hind. The fruit is dried in the sun and eaten in times of scarcity, and the seeds yield an oil which is used as a substitute for *ghí*.—Buchanania latifolia, Roxb., *Piál* or *Piár*, Beng. and Hind. Fruit collected and sold in the *bázárs*.—Mangifera Indica, Linn., *Am*. Beng. and Hind. Occasionally found wild in the jungle; use of fruit well known; seeds softened by steam and eaten in times of famine.—Spondias mangifera, Pers., *Amrá*, Beng. and Hind. Fruit eaten raw when ripe, pickled when unripe.—Zizyphus jujuba, Lam., *Baer*, Beng. and Hind. Fruit dried and stored; a cultivated variety yields a much larger fruit.—Zizyphus Œnoplia, Mill., *Sákol*, Beng., *Makai*, Hind. A small black fruit having a slightly tart taste.—Zizyphus rugosa, Lam.—Ficus Indica, Roxb., *Bar*, Beng. and Hind. Much eaten in time of scarcity by the very poorest Santáls and Kols.—Ficus religiosa, Linn., *Pipál*, Beng. and Hind. As the preceding.—Ficus glomerata, Roxb., *Dumur*, Beng.—Carissa carandas, Linn., *Kurumia* or *Bainchi*, Beng., *Karroná*, Hind. Capable of much improvement by cultivation.—Trapa bispinosa, Roxb., *Pánifhal*, Beng., *Singhárá*, Hind. Procurable in large quantities in some of the tanks. They furnish a very wholesome food.—Trapa quadrispinosa, Roxb., *Singhárá*, Beng. and Hind. Same as the preceding, but larger in size.—Eugenia jambolana, Lam., *Jámun*, Beng. and Hind. Fruit collected and sold in the *bázárs*.—Diospyros melanoxylon, Roxb., *Kend*, Beng. and Hind.; Diospyros exsculpta, Hamilt.; and Diospyros embryopteris, Roxb., *Makur-kendi*,

Beng. The same remarks apply for all these as for *Jámún*.—Olax scandens, Roxb.; *Koko-áru*, Beng.; Ægle Marmelos, Corr., *Bel*, Beng. and Hind. Chiefly used for making *sarbat*, but also prepared in other ways.—Feronia elephantum, Linn., *Kathbel*, Beng., *Kaet*, Hind. Used as the foregoing.—Tamarindus Indica, Linn.; *Tetul* or *Tentar*, Beng., *Imli*, Hind. Dried and exported in large quantities.—Alangium decapetalum, Lam., *Bágh-ánkurá*, Beng. and Hind. Fruit somewhat astringent.—Flacourtia sapida, Roxb., *Kátái*, Beng. and Hind.; F. cataphracta, Roxb., *Páni-zali*, Beng.—Phyllanthus emblica, Linn., *Oura*, Beng. and Hind. Used for making pickles.—Bauhinia variegata, Linn., *Kátchuá*, Beng. and Hind.—Mimusops elengi, Linn., *Bohl* or *Bakal*, Beng., *Maulser*, Hind.—Semicarpus anacardium, Linn., *Bellá*, Beng. and Hind. Acrid, except when perfectly ripe.—Schleichera trijuga, Willd., *Khusm*, Beng. and Hind.—Boswellia serrata, Colebr., *Sálgá*, Beng.—Karivia umbellata, Arn., *Rákál-sasá*, Beng. Both ripe and unripe fruit are eaten.—Coccinia grandis, W. and A., *Telá-kuchá*, Beng.

"Flowers.—Bassia latifolia, Roxb., *Maul* or *Mahuá*, Beng. and Hind. Extensively used throughout the District; generally cooked with *Sál* seeds. Price varies from 10 *sers* to 8 *maunds* for one rupee.—Bauhinia variegata, Linn., *Kátchuá*, Beng. and Hind. Used in *tarkáris*, or vegetable curries.—Butea frondosa, Roxb., *Palás*, Beng. and Hind. Stamens and young pods occasionally eaten.

"Leaves (*Ság*).—Antidesma diandrum, Tul., *Mutta*, Beng. and Hind.; A. ghæsembilla, Gartn., *Umtoá*, Hind. and Beng.—Flacourtia sapida, Roxb., *Benchi*, Beng., *Kaiái*, Hind.; Tamarindas Indica, Linn., *Tetul* or *Tentul*, Beng., *Imli*, Hind. The foregoing are all trees or shrubs.—Oxalis corniculata, Linn., *Amrul*, Beng. *Umthá*, Hind.; Marsilea quadrifolia, Linn., *Susni*, Beng. and Hind.; Amarantus viridis, Linn., *Bathuá*, Beng.; A. spinosus, Linn., *Kántá*, Beng.; Alternanthera sessilis, R. Br., *Sáranchi*, Beng.; Trichodesma Indicum, R. Br., *Hermaiá* or *Chhota kalpá*, Beng.; T. Zeylanicum, R. Br., *Bara kalpá*, Beng.; Mollugo spergula, Linn., *Ghimá*, Beng.—Spermacoce hispida, Linn., *Burá-mitn*, Beng.; Polygonum plebejum, R. Br., *Myá* or *Kaet*, Beng.; Colocasia antiquorum, Schott, *Kachú*, Beng., *Olwa*, Hind.; Cissampelos, *Pat*, Beng.; Marsdenia tenacissima, W. A., *Herina*, Beng.; Jussieua repens, Linn., *Dhábni* Beng.; Polycarpon depressum, Kurz., *Chirá*, Beng. The preceding are all herbs.

"Stems.—Bambusa stricta, Roxb., *Karail*, Beng., *Kopar*, Hind.

Base of stem and young shoots are eaten. The native names given are those of the stem, not of the plant itself.—Phœnix acaulis, Buch., *Jungli kájur*, Beng. Interior of stem (sago).—Nymphæa lotus, Linn., *Sáluk*, Beng., *Sirke*, Hind. Leaf, stalks, and underground stems.—Vitis quadrangularis, Wall., *Hurjorá*, Beng. Young shoots.

"Roots.—Dioscorea, *Dolá-álu*, *Dudhá-álu*, *Kanri*, and *Genti*, Beng. These roots furnish considerable nutriment, and are extensively used throughout the country.—Nelumbium speciosum, Willd., *Padma moláin*, Beng., *Banserá*, Hind.—Scirpus kysoor, Roxb., *Kesúr*, Beng. and Hind.; Curcuma, *Kewá*, Beng. These two are capable of being ground up into a useful flour."

Early Estimates of the Population.—In 1837 the population of Hazáribágh District was estimated by the Principal Assistant to the Governor-General's Agent at 320,000 souls; but I am unable to find out on what evidence this estimate was based. The Survey Department (1858-63), under Captain Hunter Thompson, returned the population of the District at 716,065 souls, yielding, with a total area of 7029 square miles, an average of 101 persons to the square mile. The Report from which I take the above figures omits to say how the results were arrived at; but the Deputy Commissioner, Colonel Boddam, states that Captain Thompson's return was founded on an enumeration of the houses, allowing 5·7 persons to each house. Colonel Boddam is also of opinion that, owing to the high rents and the practice of taking in lodgers, the number of persons living in each house is larger in the towns than in the country, and that this circumstance was over-looked in the Survey Officer's estimate. Accordingly, in his special Return to me, he gives an independent estimate of 748,000 souls. This total is thus subdivided:—Hindus, 721,150; Muhammadans, 21,000; Jains, 5000; native Christians, 800; and followers of the Bráhma Samáj, 50. Taking the area of the District, as ascertained by the recent Survey (1868-71), at 7020 square miles, this estimate yields an average of 106 persons to the square mile, being four less than that ascertained by the detailed Census of Bengal.

Census of 1872.—Early in 1869, an experimental Census was taken of the Government *mahal* of Kodarmá, in order to ascertain the best mode of conducting the elaborate Census of 1871-72. This *mahal* was under direct management at the time, and the records of a detailed village survey that had been made of it were available. For these reasons, and as containing a large proportion of unedu-

cated aborigines, it was well suited to test the ability of the people to enumerate themselves. As the event proved, they were quite unequal to the task. The Census papers were everywhere misunderstood; and on adding up the results, it was found that although the number of male children doubled that of female, there were more adult females than adult males. Further inquiry disclosed that not only had large numbers of girls been returned as women, but no male adults except the actual heads of households had been enumerated as men. To such an extent had this latter mistake been made, that in most of the circles or blocks laid out for Census purposes, the number of adult males precisely agreed with the number of houses in the block. Thus it was clear that no real help could be looked for from the people themselves. Nor were there any local establishments through which information could be collected.

It was determined, therefore, that no attempt should be made to effect a simultaneous Census, but that a gradual enumeration of the people should be made by a special salaried agency. The District was divided into a certain number of circles, which were traversed during the cold weather by paid enumerators. The enumerator visited each village within his circle, and recorded the particulars of the population resident there at the time of his visit. For the sake of economy, the work of supervision was intrusted to the regular police. The Deputy Commissioner thus describes the operations that took place under this plan:—"The primary difficulty I had to contend with was to find out the names, and consequently the number, of the villages in the District. The *thánd* or police registers were almost useless; they had not been changed or altered since the year 1833–34, when this Agency was first established. The District has been twice surveyed—once by *parganás* on the scale of four miles to the inch, and again topographically on the same scale. I had resort, therefore, to the Survey Office to obtain the names of the villages; but here another difficulty arose, for a material difference was found both in the names and number of the villages recorded when the *parganá-war* survey was taken, as compared with the details of the topographical survey. I need not add that both the lists obtained from the Survey Office differed very materially from the *thánd* lists. After considerable labour the lists were at last reconciled, the names of villages which had ceased to exist being eliminated, and new villages which had sprung up being entered in the proper *thánd* circle. The whole District was then divided into fifty-three blocks, and

each block was made over to a head enumerator, who was supplied with a list of the villages contained in it, as well as a plan in which the names of the villages and their relative positions were entered, to enable the enumerator to mark off each village when enumerated. These head enumerators were assisted most loyally by all classes, from the *zamíndár* to the *rayat*. The *zamíndárs* sent agents, generally of the Lál class, to accompany the head enumerator throughout their *zamíndáris*. On the approach of the enumerator, he was met in each village by the sub-tenure holder and the head man of the village, and the work of enumeration at once commenced, all classes assisting as far as lay in their power."

The Census disclosed a total population in Hazáribágh District of 771,875 souls, inhabiting 150,493 houses, the average density of the population throughout the District being 110 souls to the square mile. The table on the following page illustrates the distribution of the population in each Subdivision and Police Circle (*thánd*). The table is reproduced as it stands in the Census Report of 1872.

DENSITY OF THE POPULATION.—It was stated at the time of Captain Thompson's Survey, that the northern division of the District, consisting of Kharakdihá and that portion of the *zamíndárí* of Rámgarh which borders on the Grand Trunk Road, was much more thickly inhabited than the higher plateau of the south, it being estimated that the northern half of the District had 125 persons to the square mile, and the Rámgarh plateau 95. The Census of 1872 shows that the most populous Police Circles (*thánás*) are Hazáribágh, Tandawá, and Kashmár in the extreme south. These *thánás*, however, have only 150 persons to the square mile. The least populous *thánás* are Gumiá, just north of Kashmár, and Hunterganj, at the north-west corner of the District; in these *thánás* there are scarcely more than 60 persons to the square mile.

POPULATION CLASSIFIED ACCORDING TO SEX AND AGE.—The number of males is 397,045, and of females 374,830; the proportion of males in the total population being 51·4 per cent., and the average density of the population throughout the District 110 to the square mile. The excess of males over females appears to be due to immigration from the densely peopled Districts of Behar. There are a large number of Hindustání traders, shopkeepers, and subordinate Government officials in Hazáribágh who are not accompanied by their female relatives. Classified according to age, the Census gives the

[*Sentence continued on page 57.*]

ABSTRACT OF THE POPULATION OF EACH SUBDIVISION AND POLICE CIRCLE (*Thánd*) IN HAZÁRIBÁGH DISTRICT.

Subdivision.	Police Circles (*Thánás*).	Area in square miles.	Number of villages, *mauzas*, or townships.	Number of houses.	Total population.	Averages according to the Census Officers.				
						Persons per square mile.	Villages, *mauzás*, or townships per square mile.	Persons per village, *mauzá*, or township.	Houses per square mile.	Persons per house.
Sadr, or Headquarters.	Hazáribágh	594	435	17,578	89,065	150	·73	205	30	5·1
	Gumiá	684	370	8,784	42,074	62	·54	44	13	4·8
	Kashmár	149	117	4,147	22,236	149	·79	190	28	5·4
	Rámgarh	708	445	11,999	64,385	91	·63	145	17	5·4
	Tandawá	468	510	14,744	70,091	150	1·09	137	32	4·8
	Chatrá	712	699	15,446	72,864	102	·98	104	22	4·7
	Hunterganj	603	475	8,283	38,242	63	·79	81	14	4·6
	Barhí	458	410	11,428	57,196	125	·90	140	25	5·0
	Kodarmá	371	440	8,916	48,639	131	1·19	111	24	5·5
	Bagodar	450	347	8,523	42,984	96	·77	124	19	5·0
	Subdivisional total	5197	4248	109,848	547,776	105	·82	129	21	4·9
Pachambá.	Pachambá	562	811	11,325	64,789	115	1·44	80	20	5·7
	Kharakdihá	918	1328	22,152	126,506	138	1·45	95	24	5·7
	Gáwan	344	316	7,168	32,804	95	·92	104	21	4·6
	Subdivisional total	1824	2455	40,645	224,099	123	1·35	91	22	5·5
	District total	7021	6703	150,493	771,875	110	·95	115	21	5·1

[Sentence continued from page 55.]

following results:—Hindus—under twelve years of age, males, 137,245; and females, 97,407; total, 234,652, or 36·21 per cent.; above twelve years of age, males, 195,612; and females, 217,727; total, 413,339, or 63·79 per cent. of the total Hindu population. Muhammadans—under twelve years of age, males, 15,326; and females, 10,813; total, 26,139, or 36·13 per cent.; above twelve years, males, 22,154; and females, 24,045; total, 46,199, or 63·87 per cent. of the total Muhammadan population. Christians—under twelve years of age, males, 126; and females, 130; total, 256, or 16·29 per cent.; above twelve years, males, 1128; and females, 189; total, 1317, or 83·71 per cent. of the total Christian population. Other denominations not separately classified—under twelve years of age, males, 10,598; and females, 8941; total, 19,539, or 39·10 per cent.; above twelve years, males, 14,856; and females, 15,578; total, 30,434, or 60·90 per cent. of the total "other" population. Total population of all religions—under twelve years of age, males, 163,295; and females, 117,291; total, 280,586, or 36·35 per cent.; above twelve years, males, 233,750; and females, 257,539; total, 491,289, or 63·65 per cent. of the total District population.

As in other Districts of the Province, the Census Returns disclose a very small proportion of girls to boys, while in the population above twelve years of age the females are considerably in excess. This discrepancy probably arises from the fact that natives consider that girls have attained womanhood at a much earlier age than boys attain manhood. In Hazáribágh the difference between the proportion of boys and that of girls is peculiarly marked, amounting to as much as 6 per cent. in favour of the former. So large a preponderance of boys is the more inexplicable in a District containing a fair proportion of aboriginal races, who, as a rule, marry later than Hindus, and have a less keen perception of the disgrace of a daughter remaining unmarried. The proportion of males to females in the total of all ages is, 51·4 per cent.; and is, for the reason suggested above, probably correct. The percentages of children not exceeding twelve years of age, of all religions, are given in the Census Report thus:—Hindus—proportion of male children, 21·2; and of female children, 15·0 per cent.; proportion of children of both sexes, 36·2 per cent. of the total Hindu population. Muhammadans—proportion of male children, 21·2; and of female children, 15·0 per cent.; proportion of children of both sexes, 36·2 per cent. of the total Mu-

hammadan population. Christians—proportion of male children, 8·0; and of female children, 8·3 per cent.; proportion of children of both sexes, 16·3 per cent. of the total Christian population. "Others"—proportion of male children, 21·2; and of female children, 17·9 per cent.; proportion of children of both sexes, 39·1 per cent. of the total "others" population. Total population of all religions—proportion of male children, 21·2 per cent.; and of female children, 15·2 per cent.; proportion of children of both sexes, 36·4 per cent. of the total District population. It deserves notice that the proportion of children is abnormally large, being 36·4 per cent. of the total population. This is said to be due to the fact that the aboriginal races are unusually prolific. The returns of the Chutiá Nágpur Division and of the District of the Santál Parganás certainly show that the proportion of children in the total population bears a direct ratio to the relative strength of the aboriginal element. Thus, in the Santál Parganás, where the aboriginal races are most numerous, the children under twelve form as much as 40·7 per cent. of the population; a proportion which rises even to 47·5 per cent. in the Santál villages of that portion of the Dáman-i-koh which is situated in Rájmahal. Conversely in the Districts of Hazáribágh and Mánbhúm, which are largely peopled, the one by Hindustání, and the other by Bengali immigrants, the proportionate number of children falls to 36·4 and 37·1 per cent. respectively; while among the more aboriginal Districts, we find a percentage of 40·0 ruling in the District of Singbhúm, and 40·4 in that of Lohárdagá and in the Tributary Mahals of Chutiá Nágpur.

Infirmities.—The number of insanes and persons otherwise afflicted with infirmities in Hazáribágh District is returned in the Census Report as follows:—Insanes—males, 3; and females, 1; total, 4, or ·0005 per cent. of the total population. Idiots—males, 19; and females, 5; total, 24, or ·0031 per cent. of the total population. Deaf and dumb—males, 21; and females, 10; total, 31, or ·0040 per cent. of the total population. Blind—males, 78; and females, 32; total, 110, or ·0143 per cent. of the total population. Lepers—males, 11; females, none; or ·0014 per cent. of the total population. The total number of male infirm amounts to 132, or ·0332 per cent. of the total male population; while the number of female infirm is only 48, or ·0128 per cent. of the total female population. The total number of infirm of both sexes is 180, or ·0233 per cent. of the total District population.

OCCUPATION OF THE PEOPLE.—The details given in the District Census Compilation showing the occupations of the people have been omitted, as they do not stand the test of statistical criticism.

ETHNICAL DIVISION OF THE PEOPLE.—The distribution of races in Hazáribágh is mainly traceable to the geographical position of the District. On the north and north-east Hazáribágh forms the highway between Behar and Bengal Proper; and on the south and south-west, passes into and takes its character from the central highlands, the home of the non-Aryan races. A continuous stream of Hindustáni settlers from Behar has for many years been pouring into the District, through the passes in the hills that define the frontier to the north. Most of them were probably men of low caste, with spurious pretensions to Bráhman or Rájput blood. They were in fact the surplus population of the rich plains of Gayá and Monghyr forced up into the more sterile platform of Chutiá Nágpur. The advance of these immigrants either gave rise to, or largely developed, the system of sub-letting two or three villages to small farmers or *thikádárs*—a practice which crushes out all indigenous village organisation, and is most obnoxious to the aboriginal tribes. Especially is this the case with the Santáls; and it may well be that, under the pressure of the incoming Hindustánís, the Santáls left their ancient seats in *parganás* Chái and Champá, and moved further east. However this may be, the number of pure aborigines is much less in Hazáribágh than in the other Districts of the Chutiá Nágpur Division, forming only 6·61 per cent. of the entire population, compared with 62·02 per cent. in Singbhúm, and 23·38 per cent. even in Mánbhúm, open as that District is to immigrants from Bengal. Although the true aborigines are fewer, the number of semi-aboriginal castes is relatively greater, and amounts to 28·87 per cent. of the total population, as against 18·22 per cent. in Lohárdagá, 22·16 in Mánbhúm, and 6·60 per cent. in Singbhúm. It would seem, then, as if two distinct processes had been at work, and that the aborigines had not only fallen back before the advance of the new settlers, but had also largely amalgamated with them. This is supported both by the relatively high numbers of the mixed castes, described in the Census Report as Semi-Hinduised aborigines, and by the very mongrel appearance of most of those who claim to be Hindus. The dialect of the Hindus and of the mixed castes is a peculiar patois of Hindí, which bears a marked resemblance to Bengali, particularly in the words for "is," "became," "went," "came," and in the use of "*se*"

as a demonstrative pronoun. The existence of such affinities with Bengali in the patois of the more secluded portions of Hazáribágh, seems to suggest the question whether these are not remains of a still older form of Aryan speech, driven up into the wild plateau which overhangs the valley of the Ganges. There are few Bengali settlers, and the bulk of the Bengalis residing in the District are in Government employ. Hindus, therefore, of more or less mixed extraction, form the greater mass of the population.

Mr Magrath's District Census Compilation thus classifies the population of Hazáribágh. Certain of the details differ from those given in the General Census Report, the original figures having been corrected by subsequent inquiry. The list of Hindu castes will be repeated on a later page, but arranged on a different principle, according to the rank which they hold in social esteem.

Names of Nationality, Tribe, or Caste.	
I.—Non-Asiatics.	
European.	
English,	719
Irish,	508
Scotch,	101
Dutch,	1
French,	2
German,	3
Italian,	8
Portuguese,	1
Total,	1,343
American.	
Canadian,	3
Nova Scotian,	1
Peruvian,	1
West Indian,	1
Unspecified,	13
Total,	19
Total of Non-Asiatics,[1]	1,362
II.—Mixed Races.	
Eurasian,	57
III.—Asiatics.	
Natives of India and British Burmah.	
1.—Aboriginal Tribes.	
Bhar,[2]	5,838
Bhumij,	86
Birhor,	132
Chero,	11
Jhorá Gond,	7
Kol,	7,307
Mundá,	5,664
Nágeswar,	2
Naiyá,	688
Nat,[3]	286
Uráon,	1,775
Paháriá,	14
Rautiá,	4
Santál,	35,306
Total,[4]	57,120
2.—Semi-Hinduised Aboriginals.	
Bágdí,	62
Banjárá,	219
Bárí,	47

[1] The Non-Asiatics and mixed races are not quite correctly given in the Census Report.
[2] Transferred from B2.
[3] Transferred from B2.
[4] Differs from Census Report by 31 Asurs erroneously included therein, and 5838 Bhárs and 286 Nats transferred from B2.

Báurí,	392
Bediyá,	6,244
Bhuiyá	73,894
Chámár,	26,112
Dom,[5]	7,545
Turí,	11,004
Dosádh,[6]	16,718
Ghási,	3,119
Ghátwál,	31,134
Hárí,	1,183
Káorá,	302
Khairá,	2
Kharwár,	758
Bhogtá,[7]	20,546
Gonju,	7,100
Mahilí,	1,979
Mihtár,	386
Musáhar,	4,297
Pásí,	2,404
Rájwár,	1,265
Total,[8]	216,712

3.—*Hindus.*

(i.)—Superior Castes.

Brahman,	21,760
Rájput,[9]	25,023
Bandáwat,	6,264
Total,	53,047

(ii.)—Intermediate Castes.

Bábhan,	6,369
Baidyá,	70
Bhát,	1,734
Káyásth,	6,300
Doglá,	108
Total,	14,581

(iii.)—Trading Castes.

Agarwálá,	276
Bais-baniyá,	46
Baniyá,	13,669
Barnawar,	7
Gandha-baniya,	3,905
Jaswar,	1,220
Kasarwaní,	246
Kasondhán,	26
Khatrí,	340
Mahuri,	1,543
Márwárí,	90
Nichodiyá,	945
Poddár,	20
Rastogí,	112
Sinduriyá,	472
Subarnabanik,	1,778
Total,	24,695

(iv.)—Pastoral Castes.

Goálá,	92,890

(v.)—Castes engaged in preparing Cooked Food.

Gánrár,	304
Hálwái,	1,847
Kándu,	4,783
Madak,	232
Total,	7,166

(vi.)—Agricultural Castes.

Agurí,	1,966
Baraik,[10]	102
Bárui,	845
Támlí,	728
Chásá,	67
Kaibartta,	16
Koerí,	27,550
Kurmí,	40,538
Málí,	1,556
Sukiyár,	8,964
Total,	82,332

5 Differs from Census Report by 21 erroneously included.
6 Differs from Census Report by 165 erroneously included.
7 Less than the Census Report by 165 Dosádhs erroneously included.
8 Differs from Census Report by 5838 Bhárs and 286 Nats transferred to B1.
9 Differs from Census Report by 100.
10 Differs from Census Report by 169 erroneously ncluded.

(vii.)—Castes engaged chiefly in Personal Service.

Dhánuk,	620
Dháwá,	3
Dhobá,	7,530
Hajjám, or Nápit,	16,230
Káhár,	24,672
Total,	49,055

(viii.)—Artisan Castes.

Barhi (carpenter),	16,100
Kansári (brazier),	765
Kumár (potter),[11]	14,160
Láheri (lacworker),	220
Lohár (blacksmith),	10,505
Sánkhári (shell-cutter),	52
Sonár (goldsmith),	4,358
Sunri (distiller),	13,277
Teli (oilman),	29,876
Total,	89,313

(ix.)—Weaver Castes.

Jógi,	764
Patuá,	969
Durihara,	334
Tánti,	541
Total,	2,608

(x.)—Labouring Castes.

Beldár,	955
Bhula,	345
Chunári,	63
Kadar,	522
Kakkheri,	315
Korá,	315
Nuniyá,	278
Total,[12]	2,793

(xi.)—Castes engaged in Selling Fish and Vegetables.

Turaha,	4

(xii.)—Boating and Fishing Castes.

Jáliá,	34
Keut,	632
Málá,	1,466
Tior,	77
Total,	2,209

(xiii.)—Dancer, Musician, Beggar, and Vagabond Castes.

Gandharb,	9
Nágarchi,	13
Pawariya,	90
Total,	112

(xiv.)—Persons enumerated by Nationality only.

Panjábi,	8

(xv.)—Persons of unknown or unspecified Castes, 809

Grand Total of Hindus,	421,622

4.—*Persons of Hindu origin not recognising Caste.*

Vaishnav,	792
Bairági,	7
Gosáin,	1,706
Sanyási,	5
Native Christians,[13]	154
Total,	2,664

5.—*Muhammadans.*

Juláhá,	38,144
Kalál,	3,310
Kunjrah,	779
Pathán,	3,077
Sayyid,	134
Shaikh,	1,678
Unspecified,	25,216
Total,	72,338
Total Natives of India,	770,456
Total of Asiatics,	770,456
Grand Total,	771,875

[11] Differs from Census Report by 102 erroneously excluded.
[12] Differs from Census Report by 43.
[13] Sixteen Eurasians were incorrectly put down as Native Christians in the Census Re

ABORIGINAL TRIBES.—The following aboriginal tribes are found in Hazáribágh, with their numbers as returned in the Census Report:—(1) Bhar, 5838; (2) Bhumij, 86. For a detailed account of both these races, see the Account of the District of Mánbhúm. (3) Bírhor, 132. The Bírhors (*Mundá*, woodmen) are classed by Colonel Dalton as a tribe of Kolarian origin, akin to the Kharriás who inhabit the solitary hill-tops in the District of Singbhúm. They claim to be Hindus; but the Bírhors of Hazáribágh speak the Kol language among themselves, and such Hindu customs as they have are clearly derived from the people with whom they trade. The legend of their origin is thus told by Colonel Dalton:—"The Bírhors affirm that they and the Kharwárs are of the same race, descended from the sun. They came, seven brothers, to this country from Khairágarh (in the Kaimur hills); four went to the east, and three brothers remained in the Rámgarh District. One day, when the three brothers were going out to fight against the chiefs of the country, the head-dress of one of them got entangled in a tree. He deemed it a bad omen, and remained behind in the jungle. His two brothers went without him and gained a victory over the chiefs, and returning, found their brother employed in cutting the bark of the *chob*. They derided him, calling him the Bírhor or *chob*-cutter; he replied that he would rather remain a Bírhor and reign in the jungles than associate with such haughty brothers. Thus originated the Bírhors, lords of the jungles. The other two brothers became Rájás of the country called Rámgarh.

"The Bírhors are found living in the jungles on the sides of hills, in huts constructed only of branches of trees and leaves, but so made as to be quite water-tight. The entrance-door faces the east, and is about two feet from the ground. A man and his wife and young children sleep together in this hut about six feet square, but grown-up children are provided with separate huts; they lie on date-tree-leaf mats spread on the ground. They have hardly any cultivation, and never touch a plough. A man with his family who left their community and took to cultivating in the plains was considered an outcast. The men spend their time in snaring hares and monkeys, and trade in *chob*, a strong fibre of which ropes and string for various purposes are made, honey, wax, jungle fruits, and *sikás*, the sticks like bows for carrying loads *hanghi* fashion. They are seldom seen in the villages, but the women frequent the markets to sell their ropes and jungle produce.

Parents arrange the marriage of their children. The father of the bridegroom pays three rupees to the father of the bride. They have no priests, and the only ceremony is drawing blood from the little fingers of the bridegroom and bride, and with this the *tilak* is given to each by marks made above the clavicle. This I believe to be the origin of the practice, now so universal, of marking with red-lead. The convivialities of feasting and dancing conclude the day. The ceremony takes place in the bride's house, and next morning she is taken to her husband's; but after remaining there two days, she returns to her father's to complete her education and growth at home. Their ceremonial in regard to the dead is quite Hindu. They burn the body, and convey the remainder of the bones afterwards to the Ganges, they say; but probably any stream answers. They do not shave for ten days as a sign of mourning; at the end of that time, all shave and have a feast. The Bírhors worship female deities and devils. They have assigned to *Devi* the chief place among the former, and the others are supposed to be her daughters and grand-daughters; she is worshipped as the creator and destroyer. The devils are *Bíru Bhut*, who is worshipped in the form of a raised semi-globe of earth, and who is also the Kharriá god; and *Darhá*, a Mundári-Uráon deity, represented by a piece of split bamboo three feet high, placed in the ground in an inclined position, called also the *Sipáhi* sentinel. This is the immediate guardian of the site, as a god or devil of a similar name is with the Mundás and Uráons. A small round piece of wood, nearly a foot in length, the top painted red, is called *Banhi*, goddess of the jungles. A similar piece is called *Lugu*, the protectress of the earth. *Lugu* is the largest hill in Rámgarh proper, so this is their *Marang Buru*. An oblong piece of wood painted red stands for *Mahá Máyá*, *Devi's* daughter; a small piece of white stone daubed with red for her granddaughter, *Buriá Mái;* an arrow-head stands for *Dudhá Mái*, *Buriá's* daughter. They have also a trident painted red for *Hanumán*, who executes all *Devi's* orders. Sets of these symbols are placed one on the east and one on the west of their huts, to protect them from evil spirits, snakes, tigers, and all kinds of misfortune."

In another place Colonel Dalton remarks, that the Bírhors had the credit of devouring their parents, and when taxed with it, did not deny that such a custom had once obtained among them. At the same time, they indignantly repudiated the suggestion that the

any but their own relations. Colonel Dalton, however, does not believe that they ever really practised cannibalism.

(4) Chero, 11; see Account of Lohárdagá District. (5) Jhorá Gond, 7; see Account of the Tributary Mahals of Chutía Nágpur. (6) Kol, 7,307; (7) Munda, 5,664. Both these races are noticed in detail in the Accounts of Singbhúm and Lohárdagá. (8) Nágeswar, 2; see Account of Tributary Mahals. (9) Naiyá, 688; see Account of Santál Parganás. (10) Pahárivá, 14; see Account of Mánbhúm. (11) Rautiá, 4; see Account of Lohárdagá. (12) Santál, 35,306. (13) Uráon, 1,775; see Account of Lohárdagá. (14) Nat, 286; a well-known vagrant and predatory tribe, who are akin to the Bediyás. An account of them is given in vol. vii. of the *Asiatic Researches*. They do not appear to have any special connection with Hazáribágh District.

SÁNTÁLS.—The Santáls are at the present day most numerous in the District of the Santál Parganás, which has now become their true home. As, however, there is reason to believe that one of their earliest settlements was in *parganás* Chai and Champá of Hazáribágh, I notice the race in some detail here, with special reference to their connection with this District.

TRADITIONS AND ORIGIN OF THE SANTÁLS.—Owing to the migratory habits of the Santáls, and the system of shifting cultivation that they practise, their origin is peculiarly difficult to determine. Santál settlements melt away so readily, either with the disappearance of the forest, or at the contact of intruding Hindus, and leave so little in the way of permanent monuments behind, that at present I understand it to be an open question among ethnologists, from which direction the race made its way into the region which it now occupies. This region is defined by Colonel Dalton as "a strip of Bengal, extending for about 350 miles from the Ganges to the Baitaraní, bisected by the meridian of Bhágalpur, or 87° east longitude, and comprising the following Districts:—Bhágalpur, the Santál Parganás, Bírbhúm, Bánkurá, Hazáribágh, Mánbhúm, Singbhúm, Midnapur, Morbhanj, and Balasor." In the north of this tract, a strong tide of Santál migration has for the last hundred years been setting eastward from the western portion of Hazáribágh District. The foremost colonies of this movement have peopled the District of the Santál Parganás; but large settlements appear to have halted on the way, and are still found in *parganás* Kharakdihá and Golá of Hazáribágh. From an intelligent Santál *parganáit* or tribal headman of

the hilly country bordering on the Dámodar, Colonel Dalton obtained the following legend as to the origin and progress of the race:—"A wild goose coming from the great ocean alighted at Ahirí Pipri, and there laid two eggs. From these two eggs a male and female were produced, who were the parents of the Santál race. From Ahirí Pipri our progenitors migrated to Hara Duttie, and there they greatly increased and multiplied, and were called Kharwárs. Thence they removed to Khairágarh and Hurriedgarhí, and eventually settled in Chai Champá in Hazáribágh District, where they remained for several generations. There were many Bírhors in that country (they are still to be found there), and one of them seduced a Santál girl; she bore a child and cast it on a dung-heap, where it was found by the *parámánik* and *jag-mánjhi*. They brought it home and fostered it, and the child grew up and became a very powerful man, whom no one could withstand, and he demanded a wife. They said that no Santál girl should ever marry the son of a Bírhor. Then the strong man, to whom they had given the Hindu name of Madhu Sinh, declared he would violate all the Santál virgins if one were not bestowed on him in marriage. The Santáls above all things regard the honour of their maidens, and greatly alarmed at this threat, they resolved to abandon Chai Champá to be rid of Madhu Sinh. In one night they all left, with their women and children, cattle and movables, and proceeding to Chutiá Nágpur, the country of the Mundás, they came to Marang Buru (the great mountain), the god of that people, and prayed to him that Madhu Sinh and the Bírhors might not be permitted to overtake them. He interposed his great mass between them and their pursuers (the path wound up a steep *ghát*, and round from the north to the south side of the mountain), and effectually protected them. Thus our fathers became votaries of Marang Buru, the god of the Mundás, offering sacrifices of goats to him; and we continue to worship him to this day, assigning to him a place in the sacred grove with Jáhir Era and Monika. Our ancestors made no sojourn in Nágpur, but went on to Jháldá, then in possession of the Mundás, though now the Hindu Kurmís hold it." [This is confirmed by the fact that all the old village sites in Jháldá are marked by the indelible monolithic monuments of the Mundás.] "They next tried Pátkum, but found no resting-place among the Bhumij, and pushed on to Saont, and finding much forest there, settled and built good houses, and began to enjoy themselves, according to our

custom, and to dance, play and sing. But the Saont Rájá, seeing our maidens dancing, took a fancy to them, and demanded that one should be given to him. This was refused, and the people, dreading the consequence of refusal, left the Saont country and went to Sikhar. It was from our long sojourn in Saont that we took the name of Santál; we were previously called Kharwárs. We formed numerous villages in what is now the eastern part of the Mánbhúm District; but as we increased and the jungle disappeared, colonies of our people went west and took up Sonábádí and Guttiárí in *parganá* Golá, and in Sikhar, through which the Dámodar flows. My ancestor was the leader of the colony that took up Sonábádí. There were many Kharwár Rájás in those days, and one was established at Golá, to whom my ancestor paid tribute. In the time of my grandfather, Kangál Parganáit, the *ghátwálí* system was introduced (that is, they were required to protect the roads and passes), and it was in this time that the English were first seen in our country. One of them, carrying a red stick, and thence called *Lál-láthí*, came to Sonábádí. He had followers with brass-engraved plates on their breasts, and two strange-looking dogs, and he asked for the headman; and when my grandfather appeared, they tied him up and ordered him to point out land on which a bungalow could be built, and on my grandfather giving the land he was released. There was much iron ore lying about. *Lál-láthí* immediately set the smelters at work, made quantities of iron and sent it all out of the country."

On this narrative Colonel Dalton remarks:—"I am unable to identify the Ahirí Pipri; but Khairágarh and Chai Champá are in Hazáribágh or Rámgarh District, and to Chai Champá remote Santáls, as well as those in this District, frequently allude. At Chai there is an old fort, the walls of which, of earth and stones, enclose a space of about five acres of land. The tradition is, that it was the abode of Janrá, a Santál Rájá, who destroyed himself and his family on hearing of the approach of a Muhammadan army under Sayyid Ibráhím Alí, *alias* Malik Bayá, who was a General of Muhammad Tughluk, and died in the second year of Firuz Sháh's reign, on the 13th Zil Hajjah 753 A.H., or 20th January 1353 A.D. A Muhammadan officer named Hazrat Fathi Khán Duála was placed in charge of the fort, and on his dying there, a place of worship, or *dargá*, was erected near his grave. There is another fort at Mángarh, four miles from Chai,

which is also assigned by tradition to a Santál chief called Mán Sinh. He abandoned his fort on the approach of the Muhammadans. At and about Chai it is said that there were formerly six Santál chiefs, three in Behar and three in Hazáribágh District. Saont, supposed to have given the Santáls their present name, is Silda in Midnapur. Whether this name was first given to that part of the country in consequence of its being inhabited by 'Saontáls,' or whether the people took the name from the country, as stated by Bágh Rái, I cannot tell. But putting together all the facts and legends that we possess, it is probable that the Santáls were originally located in Eastern Bengal from the sea-coast inwards, and that colonies were gradually pushed on to Hazáribágh District, or to Chai Champá and Kharakdihá, and thence northward; and that Bágh Rái's account of their movement eastward from Chai Champá to Saont through Chutiá Nágpur is the reverse of what took place."

This story of the wanderings of the race corresponds substantially with that given by Dr Hunter in the *Annals of Rural Bengal.** At the time when Dr Hunter wrote, neither Chai Champá nor Silda had been identified; and he conjectured that "Chai Champá" might mean the Land of Flowering Trees, and be some place in the higher valleys of the Brahmaputra. This hypothesis, by bringing the Santáls from the Himálayas down the Brahmaputra valley into the plains of Bengal, accounted for the two fixed ideas of the race—their reverence for mountains, and their memories of a great river. Colonel Dalton's theory, as given above, takes up the race from the point at which Dr Hunter leaves them, and reversing the route described by Bágh Rái, brings them to Chutiá Nágpur from the sea-coast of Eastern Bengal. But this view is hardly consistent with Colonel Dalton's own opinion, that the Santáls are related to the Kharwárs, a race of semi-Hinduised aborigines of admittedly northern origin. One of the Santál tribes bears the name of Kharwár, and the two races resemble each other in features and complexion. If, then, the connection between the Santáls and Kharwárs be extended to the Kiratis, whose language Mr Hodgson considers to be Kolarian, the fact that these latter are still numerous in Dinájpur may indicate the route by which the three tribes descended

* This Account, as stated in the Introduction, has been compiled by Mr Risley. In the following paragraphs, I have thought it best to present his views in his own words.—W. W. H.

from the north-eastern hills. If two out of three cognate tribes can be shown to have made their way westward along the outskirts of the Himálayas, it seems superfluous to assume that the third went round by the sea-coast of Eastern Bengal. If the entire tenor of Bágh Rai's narrative is to be summarily reversed, it can hardly be worth anything as evidence, except to show that at some time or other there were settlements of Santáls at the places which he enumerates. But the mere fact of Bágh Rái's tradition commencing with a Santál settlement in Hazáribágh, is itself sufficient proof that the legend is of comparatively recent date. And once regarded as an account of recent migrations, it is fairly in accord with actual facts. Without hazarding the conjecture that Ahirí Piprí may be no other than *parganá* Ahurí in the north-west of Hazáribágh District, it is clear that a large and important Santál colony once occupied Chai Champá. The tradition which Colonel Dalton records about the fort at Chai is to some extent corroborated by the following passage from the legends of the Southern Santáls, collected by the Rev. J. Phillips, and published in Appendix G. to *Annals of Rural Bengal*, ed. 1868 :—"Dwelling there (in Chai Champá), they greatly multiplied. There were two gates, the Ahin gate and the Báhini gate, to the fort of Chai Champá." If, moreover, the date of the taking of this fort by Sayyid Ibráhím Alí were assumed to be about 1340 A.D., the subsequent migrations of which Bágh Rái speaks would fill up the time that intervenes between the departure of the Santáls from Chai Champá and their settlement in the present Santál Parganás. Speaking generally, these recent migrations have been towards the east, which is the direction that they might *primâ facie* have been expected to follow. The earliest settlements which Santál tradition speaks of, those in Ahirí Piprí and Chai Champá, lie on the north-western frontier of the tableland of Hazáribágh, and in the direct line of advance of the numerous Hindu immigrants from Behar. That the influx of Hindus has in fact driven the Santáls eastward is beyond doubt; and the line which they are known to have followed in their retreat corresponds substantially with that attributed to them in Bágh Rái's legend.

If, then, it is probable that the Santál legends refer to migrations of comparatively recent date, we are thrown back upon their language and physical characteristics for the real origin of the tribe. On this point the testimony is clear. Santálí belongs to the Kolarian branch of the southern division of the Turanian family of languages, and

it is allowed on all hands that the origin of the Kolarian tribes was in the remote north-east. It should be remarked, however, that neither Santáls nor Kharwárs have the distinctive Mongolian features in any high degree. On this point Colonel Dalton writes:—"The Santáls, like the Kharwárs, belong to, or have mixed much with, the dark races of India. The Cheros, Hos, and Mundás are, on the whole, fairer, and preserve more distinctly traits of the Tartar type. The Santáls are noticeable for a great vagueness in the chiselling of the features, a general tendency to roundness of outline where sharpness is more conducive to beauty, a blubbery style of face, and both in male and female a greater tendency to corpulency than we meet in their cognates. Their faces are almost round; cheekbones moderately prominent; eyes full and straight, not obliquely set in the head; nose, if at all prominent, of somewhat a *retroussée* style, but generally broad and depressed; mouth large, and lips very full and projecting; hair straight, coarse, and black. Mr Mann remarks of them, and I concur in the remark, that their cast of countenance almost approaches the Negro type. The females, he says, have small hands and feet, and are ox-eyed, and these are characteristics which the tribes linguistically allied to them do not possess."

To sum up the question, it appears from the affinities of the language that the Santáls are a Turanian race of north-eastern origin, who by long intercourse and intermarriage with the black aboriginal races of Central India have lost their distinctive Mongolian features. No one can say with certainty by what route they came into Chutiá Nágpur, but from their relationship and possible identity with the Kharwárs, it is probable they made their way westward along the foot of the Himálayas through the present District of Dinájpur.

Religion of the Santáls.—On the Santál religion Colonel Dalton writes as follows:—"Among the Santáls in Chutiá Nágpur, Sing Bonga, the sun, is the supreme god, the creator and preserver. The other deities are Jáhir Era, Monika, and Marang Buru, and they are all malignant and destructive. In the eastern Districts the tiger is worshipped; but in Rámgarh, only those who have suffered loss through that animal's ferocity condescend to adore him. If a Santál is carried off by a tiger, the head of the family deems it necessary to propitiate the Bágh Bhut (tiger-devil). Occasionally the villagers all join in sacrificing a bullock or buffalo to Marang Buru. They have no very clear conception to what Buru, or mountain, their devotions should be especially paid, but he is honoured as Lord of

the Jungles. The Santáls farther east adore as deities Chando Bonga, the moon-god, and Bágh Bhut, the tiger; and to be sworn on a tiger-skin is the most solemn of oaths." "A very important distinction is observed by all the Kolarians in the motive of the sacrifices to the supreme deity, and those by which the minor gods are propitiated. To Sing Bonga the sacrifice is to secure a continuance of his mercies and for preservation. The other deities are resorted to when disease or misfortune visit the family, the sacrifice being to propitiate the spirit who is supposed to be afflicting or punishing them."

The religious festivals of the Santáls are superintended by the *naia* or village priest. "He has lands assigned to him, but out of the profits of his estate he has to feast the people twice in the year —at the festival of the *Sarhul*, held towards the end of March, when the *sál* tree blossoms, and at the *Moi Muri* festival, held in the month of September–October, for a blessing on the crops. At the *Sohrai* feast, the harvest-home in December, the *jag-mánjhí* entertains the people, and the cattle are anointed with oil and daubed with vermilion, and a share of the *háudiá*, a rice-beer, is given to each animal. Every third year in most houses, but every fourth or fifth year in some, the head of the family offers a goat to the sun-god *Sing Bonga*, for the prosperity of the family, especially of the children, 'that they may not be cut off by disease or fall into sin.' The sacrifice is offered at sunrise on any open space cleaned and purified for the occasion. Ancestors are worshipped, or rather their memory is honoured, at the time of the Sohrai festival, and offerings made at home by each head of a family. In the meantime the *naia* propitiates the local devils, *bhuts*. In many villages the Santáls join with the Hindus in celebrating the *Durgá Pugá*, the great festival in honour of Devi, and the *Holi* in honour of Krishna. Their own priests take no part in the ceremonial observances at those Hindu feasts, which are left to the Brahmans. The person or persons who offer sacrifices at the Santál feasts have to prepare themselves for the duty by fasting and prayer, and by placing themselves for some time in a position of apparent mental absorption. The beating of drums appears at last to arouse them, and they commence violently shaking their heads and long hair, till they work themselves into a real or apparent state of spasmodic action, which is the indication of their being possessed. They may then give oracular answers to interrogatories regarding the future, or declare the will of the spirit invoked

or about to be propitiated. When the demoniacal possession appears to have reached its culminating point, the possessed men seize and decapitate the victims, and pour the blood into vessels ready placed for its reception."

HABITS AND CUSTOMS OF THE SANTÁLS.—"Santáls are not over-particular about food, but nothing will induce them to eat rice cooked by a Hindu, even by a Bráhman. Unfortunately, during the famine of 1866 this was not known to us. The cooks who prepared the food distributed at the relief centres were all Bráhmans; and it was supposed that this would suit all classes, but the Santáls kept aloof, and died rather than eat from hands so hateful to them. They have no tradition to account for this bitter feeling. The animosity remains, though its cause is forgotten."

The greatest freedom of society is allowed between the young of both sexes. Child-marriage is unknown, and it is said that Santáls generally marry for love. The parents, however, usually make the arrangements, and a price of about five rupees is paid for the girl. A peculiar feature in Santál marriages is the solemn meal that the bride and bridegroom eat together. This act is considered the most important part of the ceremony, as by it the girl ceases to be a member of her own family and passes into that of her husband. It is peculiar to the Kolarian tribes, and has not at present been affected by that tendency to adopt Hindu ritual which is observed among aboriginal races. "A Santál seldom has more than one wife, who is treated with most exemplary kindness and consideration. Should the husband be, for any reason, such as her barrenness, induced to seek a second partner during her lifetime, the first wife is never deposed from her position as head of the household; the second wife must obey her and serve her."

In their funeral ceremony, which differs from that of the other Kolarian tribes, the Santáls have not escaped the influence of Hinduism which is referred to above. Colonel Dalton describes it as "a rough outline of the Bráhman ritual, which only wants filling in." Even the practice of "uniting the dead with the fathers," by preserving the bones of the skull after cremation, and eventually consigning them to the waters of the Dámodar, is borrowed from Bráhmanical usage.

The two great AMUSEMENTS of the Santáls are dancing and playing the flute. Colonel Dalton writes of the Santál dance:—"There is always reserved an open space in front of the house of the *jag-mánjhi*

or headman as a dancing place. To this the young men frequently resort after the evening meal, and the sound of their flutes and drums soon attract the maidens, who smooth and adjust their long hair, and adding to it a flower or two, blithely join them. It is singular that in this national amusement of the Santáls we have handed down to us a most vivid living representation of one prominent scene in the sports of Krishna in Braja and Brindában. There is nothing in modern Hindu life that at all illustrates the animated scenes so graphically delineated in the *Púránas;* but the description of the *rása* dance in chapter xiii. book v. of the *Vishnu Puráná* might be taken literally as an account of the Santál *jumhĭr*. We have in both, the maidens decked with flowers and ornamented with tinkling bracelets, the young men with garlands of flowers and peacocks' feathers, holding their hands, and closely compressed, so that the breast of the girl touches the back of the man next to her, going round in a great circle, limbs all moving as if they belonged to one creature; feet falling in perfect cadence; the dancers in the ring singing responsive to the musicians in the centre, who, fluting, drumming, and dancing too, are the motive power of the whole, and form an axis of the circular movement." Of the flute playing he says:—"The peculiar emblem of the Santáls should be the flute; they are distinguished from all people in contact with them by their proficiency on that instrument. Made of bamboo, not less than one inch in diameter, and about two feet in length, it is equal in size to the largest of our concert flutes, and has deep rich tones."

The COMMUNAL ORGANISATION of the race is still tolerably complete. A Santál village is a compact body, the members of which will stand by one another, and, as I have observed below in the paragraphs on village headmen, will even desert their cultivation if the *thikâ* or farming-lease of the village is given to any one but a Santál. "The polity of the Santáls is very patriarchal. In each village there is, first, a *jag-mánjhi*, whose most important duty is apparently to look after the morals of the boys and girls, and, if he is at all strait-laced, they must often lead him a hard life; second, a *parámánik*, whose business it is to attend to the farming arrangements, and to apportion the lands. He disallows any monopoly of peculiarly fertile rice lands; all must take their share of good and bad. He has to look after the interest of new settlers, and to provide for guests, levying contributions for the purpose on the villagers. All the offices

are hereditary; when a new settlement is formed, the office-holders are elected; after that the next of kin succeeds. There is a village priest, who is called *naia* (Sanskrit, *nayaka*; Vulgo, *láyá*). This is a word of Sanskrit derivation; and as there is no name in the Santáli language for such a functionary, it is probably not an original institution."

EMIGRATION from Hazáribágh District has at no time during the last ten years been very extensive, though a gradual increase in the number of emigrants may be traced during the concluding years of the period since the passing of Act II. of 1870 (Bengal Council), and Act VII. of 1871. But even in these latter years the numbers are not so great as they were in 1865 and 1866. In 1865, the earliest year for which any returns are available, the number of persons who left the District was 1213. In 1866, the famine year, the numbers rose to 1420, and fell in 1867 to 381; in 1868 to 181, and in 1869 to 102. The causes of this sudden diminution cannot be pointed out with any certainty, though it may be plausibly assigned to the lessened demand from the tea-districts, which were fully stocked with labourers in 1866. The statements from which the figures are taken do not, however, show to what places the emigrants went. From 1872–73 detailed returns are available on this point, showing that in that year 100 persons left the District for Assam, and 9 for Cachar, under Act II. of 1870; while under Act VII. of 1871, 42 persons emigrated to Demerara, and 6 to Jamaica; total emigrants to tea-districts, 109; total emigrants beyond sea, 48; grand total of all persons leaving the District, 157. In 1873–74, the number of emigrants was as follows:—under Act II. of 1870, to Assam, 280, and to Cachar, 91; under Act VII. of 1871, to Surinam, 105; to Demerara, 94; and to the Mauritius, 80; total to tea-districts, 371; total beyond sea, 279; total emigrants, 650. Last year, 1874–75, emigration to the tea-districts increased largely, the numbers being, 325 to Assam, 138 to Cachar, and 23 to Sylhet; while the number of emigrants beyond sea fell to 5 for Demerara, and 4 for Natal. The general result therefore was, emigrants to tea-districts, 486; emigrants beyond sea, 9; grand total, 495. This sudden reduction in the number of emigrants to Demerara and Jamaica is the more surprising, as Hazáribágh has hitherto been the one District of the Chutiá Nágpur Division from which coolies were obtained for those colonies. It probably has no deeper cause than the absence or inefficient action of the recruiters during the past year.

IMMIGRATION into the District has gone on without intermission

for many generations. The various classes of subordinate Government officials, traders, merchants, writers (Lálás or Káyasths), and even messengers (peons), are largely recruited from Behar. A considerable proportion of these immigrants settle permanently in the District, and the more prosperous acquire land, both at their original homes and in Hazáribágh. The bulk of the *thikádárs* or small farmers all over the District are natives of Behar; and it is through their influence in the main that the present system of rack-renting has been introduced.

HINDU CASTES.—The following is a list of the principal Hindu castes in Hazáribágh District, arranged as far as possible in order of precedence, and showing the occupation and numbers of each. The numbers are taken from the Census Report of 1872. (1). Bráhman; members of the priesthood; many of them are also landholders, and others are employed as ministerial officers by Government, and in a variety of operations by private persons. Number in 1872, 21,760. The Bráhmans of Hazáribágh do not, as a class, command the degree of respect that is accorded to a Bráhman in Bengal. On this point Colonel Dalton remarks:—"The Bráhmans of the present day who devote themselves exclusively to priestly duties, are far outnumbered by those who have taken to secular pursuits. The most ignorant amongst the former are usually the most bigoted and assuming." Of the Bráhman *gotras* or septs which are found in the District, the Kányakubja or Kanaujiá, the Srotri, Yajurvedí, Sakalwípí, and Rárísrení are engaged in priestly offices and in service, or hold land. Gaur Bráhmans read *póthis* or sacred books, and cultivate land. The Maithilí are temple-readers, and also deal in grain. The Dhámí class are the persons who, under the direction of the Gayáwáls, or proprietors of the shrines, perform the ceremonies for the pilgrims to Gayá. They are a dissolute set, who eat meat and marry as many wives as they please. It is said that they make over one-fourth of their profits to the Gayáwáls. Jyaotishí Bráhmans are the priests of the lower classes. They pretend to astrological knowledge, and are employed as go-betweens in arranging marriages. The Kantáhás or Mahápátras are the Bráhmans employed to perform the *sráddha*, or funeral rites in memory of deceased ancestors. Their name is derived from the iron hook (*kantá*) used by them to mark the sacred bull-calf, whose mock-marriage forms part of the ceremony. Kantáhás will eat the *pinda* or funeral cake, the flesh of fowls, and a mixture of oil and milk, which is expressly forbidden by the *Sástras*. Their touch

is held to be pollution, only to be got rid of by bathing and changing the clothes. (2) Chhatrí or Rájput; landholders and cultivators; they also trade in grain and lend money, and serve as *darwáns* or doorkeepers; 25,023. The most respected clans among them are the Panwár or Ujjainí, from whom were drawn the Bhojpuria sepoys of our native army, and the Nágbansí. These latter are peculiar to Chutiá Nágpur. They are acknowledged as Rájputs of pure blood, and intermarry with the best families. (3) Káyasth; writers and clerks in Government or private employ; 6300. Sribasthab, Amasthá, and Karan are the only three of the twelve families of Káyasths that are represented in Hazáribágh. They spend large sums on their marriage festivals, and are peculiarly addicted to the use of spirituous liquors. It is observed that the Káyasths of this District associate freely with Muhammadans, and have so far adopted their customs as even to observe Muhammadan festivals. (4) Bandáwat; a cultivating caste, who wear the *janáo* or sacred thread, and claim to be Rájputs, relying perhaps on the tradition that a Bandáwat Rájá once ruled in the District of Gayá. They are described by Colonel Dalton as a class of cultivators; number, 6264. (5) Bábhan or Báman, called also Bhuinhár or *zamíndárí* and military Bráhmans. In Behar they claim to be Sarwariá Bráhmans, and are classed by Buchanan Hamilton as Sakaldwípí. Sir George Campbell in his paper on "Indian Ethnology" describes them as "a class of bastard Bráhmans, called Bámans or Bábhans, to which belong both the Rájá of Benáres and almost all the great landholders of Behar. There seems to be no doubt that this class is formed by an intermixture of Bráhmans with some inferior caste. They live in strong and pugnacious brotherhoods, and are in character much more like Rájputs than Bráhmans." This view is supported by the fact that the names of some of the subdivisions of the Bábhans correspond with those of the Rájput clans. Number in Hazáribágh, 6369. (6) Baidyá; hereditary physicians, but many of them have abandoned their traditional employment. They number only 70, and are little heard of. (7) Bhát; hereditary bards and genealogists, but have now taken to cultivation. Many of them live by begging, and the entire caste is far from respectable. They call themselves Rájbhát, and are said to wear the sacred thread; number, 1734. (8) Krishnapakshi or Doglá is a name applied to the sons of the higher classes by women of low caste. They appear to have found employment chiefly as writers; number, 108. (9) Agarwálá; an important subdivision of the mercantile caste. The

name is derived either from the city of Agra, or, according to Mr Elliot, from Agroha in Harianá, whence they originally migrated after the capture of that place by Shaháb-ud-dín Ghorí. The Agarwálá is one of the *gachchas* or families of the Jains, and most of its members profess that religion; number, 276. (10) Márwárí; merchants and traders, mostly Jains; 90. The name clearly denotes a nationality rather than a caste. (11) Nápit (*nái*) or Hajjám; barbers; 16,230. (12) Lohár or Kámár; ironsmiths; 10,505. (13) Kumbhár; potters; 14,160. (14) Telí; oil-pressers and sellers; 29,876. (15) Támulí; growers and sellers of betel (piper); 728. (16) Bárui or Barei; follow the same occupation as the preceding, though it is alleged, on insufficient ground, that the Bárui are the growers and the Támlí the sellers of betel; number, 845. (17) Sukiyár; grow, prepare, and sell *gur* or molasses; 8964. (18) Málí; gardeners; 1556. (19) Gandhabanik; perfume sellers; 3905. (20) Sánkhárí; makers of shell-bracelets; 52. (21) Kánsárí; braziers and workers in bell-metal; 765. (22) Baisbaniá; a subdivision of Baniyás; 46. (23) Baniyá; general traders; 13,669. (24) Barnawár; a subdivision of Baniyás; 7. (25) Jaswár; a subdivision of Kurmís; 1220. (26) Kasarwáni; belong to the Baniyás; 246. (27) Kasandhan; also a subdivision of Baniyás; 26. (28) Khatrí; a trading and money-lending caste, who probably came from the Panjáb, where Khatrís engross the bulk of mercantile and administrative work. Sir George Campbell in his *Indian Ethnology* considers them to have the best claim to be the descendants of the old Kshatriyas. The Rájputs of Behar, however, will not eat with them; and none of the subdivisions of the Khatrís bear the same name as any Rájput clan. Buchanan Hamilton speaks of a large agricultural class in Behar called Kshatrís, Khatrís, or Chhatrís, who were distinct from, and somewhat less esteemed than Rájputs. But he can scarcely have been referring to the caste just described, as they confine themselves to trade, and do not engage in agriculture. The Khatrís are enumerated in the Census at 340 in Hazáribágh. (29) Mahuri; numbering 1543 and (30) Nichodiyá; numbering 945, are subdivisions of the Baniyás. (31) Aguri; are described by Wilson as a low class of cultivators, and are supposed to be identical with the Ugrakhatri of Manu; 1966. (32) Goálá; cowherds and milkmen; 92,890. The *gots* or families found in Hazáribágh are Ghoshin, Majraut, and Kishnaut, all of which belong to the larger subdivision of *gwalbans*. (33) Madak, 232, and (34) Hálwái, 1847, are both sweetmeat-makers. Madak appears to be the Bengal, and Hálwái the Behar name for this caste.

(35) Gánrár; number, 304, is a division of (36) Kandu, who prepare *chirámurki* or parched rice; number, 4783. (37) Chásá; cultivators; the name of an occupation rather than a caste; 67. (38) Kaibartta; the great agricultural caste of Bengal, numbers only 16 in Hazáribágh. It is stated in the Census Report that Chásá is a name assumed by Kaibarttas who cultivate in order to distinguish themselves from the fishing Jáliás, who also claim to be Kaibarttas. (39) Vaishnav or Bairágí; followers of Chaitanya, a religious reformer who lived in Nadiyá in the sixteenth century; 799. (40) Tántí; weavers, who also cultivate land; 541. (41) Baraik; a subdivision of Koerís; 10[illegible]. (42) Sonár; goldsmiths, held to be a pure caste in Behar; 43[illegible]. (43) Subarnabanik; the goldsmith caste of Bengal, reckoned impure; 1778. (44) Poddár; weighers of money and traders; 20. (45) Rastogi; traders; 112. (46) Sinduriá; sellers of *sindur* or vermilion; 472. They were till recently the chief inoculators for small-pox in Hazáribágh, and are now employed as vaccinators. (47) Láherí; makers of lac ornaments, 220. (48) Barhí; carpenters; 16,100. (49) Sunrí or Surí; by origin spirit-distillers, but many of them are traders and cultivators, and the caste is well-to-do in Behar; 13,277. (50) Ghátwál; originally guardians of the hill-passes, and Bhuiyás by descent. The official title of Ghátwál, sounding more distinguished than Bhuiyá, has become a caste appellation. The wealthier Ghátwáls are considerable landholders in the north-east portion of Hazáribágh, and claim to be *zamíndárs* under the Permanent Settlement of 1793. The poorer members of the class are cultivators, labourers, and palanquin-bearers; number in Hazáribágh, 31,134. (51) Káhárs; servants and *pálki*-bearers. The palanquin-bearing division of them are called Rawání Káhárs. They stand well with the higher castes, whose water-carriers they are, and who will drink from their hands. They are also fishermen and cultivators. Káhárs marry widows, and allow great license of divorce. The husband assembles a *panchávat* or village council of five neighbours, and in their presence tears a *sál* leaf as a symbol of separation. A wife has a similar right on refunding before a *panchávat* the customary Rs.7, which the husband paid to her parents at the time of her marriage. Number, 24,672. (52) Koerí; allied to the Kurmís, from whom they are distinguished by being skilled market-gardeners as well as agriculturists. They rear vegetables, tobacco, opium, and other produce that requires more careful cultivation than the staple crops. The Koerís are generally allowed to be *Sat-*

sudras or pure *Sudras*. Their own tradition is, that they were produced specially by Mahádeo and Párvatí for the gardens of the holy city of Benáres. They are a hard-working and quiet set of people; number in Hazáribágh, 27,550. (53) Dhánuk; a low caste of Hindus, supposed from their name to have been archers. They are in some way connected with the Kurmís, and are employed in personal service and agriculture; 620. (54) Dháwá; labourers; 3. (55) Kurmí; cultivators; 40,538. A full notice of the Kurmís is given in the Statistical Account of Manbhúm District. (56) Dhobá; shermen; 7530. (57) Jogí; gather silk cocoons, and make silk-; 764. (58) Patuá; make silk-thread and string beads; 969. ihar; string-makers; 334. (60) Beldárs; labourers; 955. or Bhulá; labourers and birdcatchers; 345. (62) Chu- rners; 63. (63) Kádar; labourers; 522. (64) Kak- akers; 315. (65) Nuniyá; makers of saltpetre; 278. probably of aboriginal extraction; are employed in dig- s and wells and all kinds of earthwork; 315. (67) Jáliá; en, said to be a branch of Kaibarttas; 34. (68) Keut or at; fishermen, taking their name from Hindí *kená*, to row; 632. (69) Málá; the great boating and fishing class of Behar; 1466. (70) Tior or Tiyar; are connected with the preceding, but also engage in trade; 77. (71) Bágdí; supposed by Colonel Dalton to be the remnant of an aboriginal race, who by intermarriage with low-caste Hindus have nearly effaced their primitive lineaments. They are employed as general labourers; number, 62. (72) Turáhas; labourers; 4. (73) Bhuiyá; 73,894. Sir George Campbell, in his *Indian Ethnology*, suggests that the Bhuiyás of Western Bengal are connected with the Buis of Madras and the Central Provinces. With this theory Colonel Dalton agrees, for the reasons that the Bhuiyá features are of a Tamulian cast, and that the tribe is found in its greatest strength and purity on the southern frontier of Bengal. He accordingly classes them with the Southern or Dravidian family of aboriginal races. In another place, he refers to their kinship with the Bárah Bhuiyás, who were at one time the dominant race in Assam, where they left behind them great works in memory of their rule. It would appear from this that the Bhuiyás must have spread towards the north-east from Central and Southern India; for if their original seat had been in Assam, their features would partake of the Mongolian rather than the Tamulian type. The Bhuiyás of Hazáribágh are now in the humblest positions, and but few of them

attain to the dignity of owning land. The proprietors of the estates around Párasnáth Hill, though pretending to be Kshattriyas, are in fact Bhuiyás, and have the characteristic physical traits of their origin. They are swarthy almost to blackness, and have coarse negro-like features. The more primitive families of the Bhuiyá race are noticed in the Accounts of Singbhúm and the Tributary Mahal of Bonái. (74) Báurí; 392; are joined with the Bágdís by Colonel Dalton as "the remnant of an aboriginal race, who by intermarriage with Hindus of low caste have nearly effaced their primitive linea ments." He also considers that the fact of Báurís being still in p session of *ghátwáli* tenures as ancestral fiefs, shows that they onc a proprietory interest in the soil. The Báurís of Hazári labourers, and carry palanquins. They are gross feede their caste if they eat a heron or a dog. The emblem of the tribe; and they account for the sanctit by saying that they found it necessary to set up a sac and chose the dog, because he was useful when alive, nice to eat when dead. (75) Dom; basket-makers and scavengers, also employed as executioners, whence some fa of them bear the title of *Jallád*. They live on the outski of villages, and seldom work in the fields. Number, 7545. (76) Dosádh; 16,718. A thoroughly disreputable caste, especially addicted to cattle-stealing, burglary, and *dákáiti*. Most of the village watchmen (*chaukidárs*) of Hazáribágh District are of the Dosádh class, on the principle that the man who does the thieving should also do the watching. They are described by Colonel Dalton as "a type of a low-caste tribe, living freely, and, according to Hindu notions, impurely, but apparently rather of Aryan than Turanian origin. The men, who are of strong build, and as tall as the average Hindu, have coarse features, but with nothing of the Chinese or Negro about them. They have adopted the worship of the demon Ráhu, who is supposed to cause eclipses by his periodical attacks on the sun and moon, in revenge for having had his head cut off by Vishnu. The Dosádhs not only adore him, but claim to be his descendants; their upper class from Ráhu and his wife, and their second class from Ráhu and his wife's *femme de chambre*. Their mode of worshipping their founder is as demoniacal as he could wish. The faithful ascend ladders formed of sword-blades, so placed as to bring the sharp edge in contact with the sole of each foot, pressing as it ascends; and they afterwards walk through a ditch filled with

blazing faggots, on which oil or *ghí* is poured to intensify the heat, with no more injury than was sustained by Shadrach, Meshach, and Abednego in the fiery furnace. They, like the Chámárs, started a reformer some three or four years ago, who preached deism and purity of life; but after a year's trial of abstinence, they came to the conclusion that it did not suit them, and relapsed." (77) Gulguliá; not separately entered in the Census Report. They are a vagrant tribe, who live by begging, pilfering, exhibiting monkeys and goats, and gleaning what is left on the ground when the crops are cut. ne of them are said to conceal their profession under the garb of or religious mendicants. They do not live in villages, but l hovels of reeds and leaves on the outskirts. The women and pretend to cure toothaches, ear-aches and barrenness. ll eat the leavings of all other castes, except the Dhobís en. I cannot find out the reason of this peculiar excep- is probably intended as a concession to respectability and udice, like the sacred dog of the Báurís. The name *Gul-* "the chatterers," seems to refer to their use of a sort of gipsy s, which is only understood among themselves. (78) Turí; a anch of the Doms, are labourers, basket-makers, and fishermen; 11,004. (79) Chámár; preparers of hides and workers in leather; 26,112. This number apparently includes the Muchí Dabgars, who make leather vessels to hold *ghí*. The latter, however, affect to be higher than the Chámárs, and do not intermarry with them. (80) Gandharb; live by dancing and begging, and buy children whom they adopt for prostitution; 9. (81) Nágarchi; drum-players; 13. (82) Pawáriyá; dancers; 90. (83) Banjárá; labourers; are described by Wilson as a numerous tribe, of obscure origin, extending along the foot of the mountains from Haridwár to Gorakhpur, and com- prising both Hindus and Muhammadans; 219. (84) Bárí; collec- tors of *sál* leaves and makers of leaf-plates; they come from Oudh, and are properly torch-bearers; 47. (85) Mahilí; labourers and basket-makers; 1979. Their origin is obscure. Colonel Dalton considers them a branch of the Bediyás (below, No. 97), and they have also been classed as Bhumij, and from their working at baskets, as Doms. (86) Rájwár; a mongrel tribe, especially addicted to highway robbery and *dákáití*. They live in the villages as a kind of serfs and bearers of burdens, carry palanquins, and sometimes till a little land for themselves. By Dr Buchanan Hamilton and Sir George Campbell they are classed as aborigines. Another conjecture ranks

them as Rájbhars, and they themselves claim kindred with Rájputs, Kurmís, and Musáhars. The Bengal members of the caste admit that they were the offspring of Kurmís and Kols. Hindus regard them as very impure, and will not take water from their hands. The Rájwárs of Sargujá and the neighbouring estates are a far more respectable class than those of Hazáribágh. They are noticed in detail in the Account of the Tributary Mahals of Chutiá Nágpur. Number in Hazáribágh, 1265. (87) Musáhar; live in round huts like ther Bhuiyás with whom they are classed by Buchanan Hamilton and Colonel Dalton. The Thárus have a legend that a former chief priest of th was a Musáhar, and one of the Thárú tribes is called by On this evidence Mr Magrath in the Census Report of them with Musáhars. It is possible, however, that the n *har*, "rat-eater," does not denote a distinct caste, but is of the various terms of reproach that Hindus have lav the aboriginal races. Nearly all such terms, as has freq remarked, have reference to the supposed foul habits of feed non-Aryan tribes. Number, 4297. (88) Bhogtá; a family Kharwárs; labourers and exorcisers of demons; 20,546. Ganju; classed in the Census Report as a tribe of Rájwárs, but no mentioned as such by Colonel Dalton; 7100. (90) Pásí, or Tirsuliyá; were famous for their skill in archery, and their traditions say that they were formerly Bhars, and used to intermarry with Rájputs. They are now chiefly occupied as makers and sellers of palm-toddy. Number, 2404. (91) Khairá; cultivators; noticed in detail in the Account of Lohárdagá District; 2. (92) Kharwár; cultivators; 758. For a full notice of the Kharwárs see the Account of Lohárdagá District. It need only be remarked here, that the Rájá of Rámgarh and almost all the men of proprietory rights of old standing in the Rámgarh estate are Kharwárs. (93) Ghásí; labourers and scavengers; are fully described in the Account of Lohárdagá District; 3119. (94) Hárí; scavengers; 1183. (95) Karmálí; servants and thieves; not separately enumerated in the Census. (96) Káorá; swine-keepers; 302. (97) Bediyá; 6244. The Bediyas proper are a well known gipsy caste of Lower Bengal; but I have discovered that by far the larger proportion of the people returned as Bediyás in the Census Report for Hazáribágh, are not Bediyás at all but Bidiás. The Bidiás, who frequently describe themselves by the term Bidia-Máhato, are in fact pure Mundas, who have emigrated from Chutiá Nágpur Proper

the wilder parts of Hazáribágh and Mánbhúm, and have lost original language. Their identity with the Mundas of Chutiá pur is, however, placed beyond dispute by the character of their ires, the existence among them of the *páhn* as a village official, practice of smelting iron, and the similarity of the names of *kílis* or sub-tribes with those of the Mundas. On the other there is not a single point of resemblance between them and diyás, as they are steady cultivators, do not wander about the bear a high character for honesty.

ng list of Hindu castes is exclusive of 809 persons of unspecified caste, 8 persons enumerated by nationality 65 persons of Hindu origin not recognising caste (except vs, who are included in the list). The list also includes ed as belonging to aboriginal tribes, but who have abandancient faiths and embraced Hinduism.

us Division of the People.—The great bulk of the inf the District (83·9 per cent.) are Hindus; the remainder of Muhammadans and Hill people professing aboriginal th a small sprinkling of Christians and followers of the a Samáj. According to the Census Report of 1872, the Hindus of Hazáribágh District number 332,857 males, and 315,134 females; total, 647,991, or 83·9 of the total population: proportion of Hindu males to total Hindu population, 51·4 per cent. The Muhammadans number 37,480 males, and 34,858 females; total, 72,338, or 9·4 of the entire population: proportion of Musalmán males to total Musalmán population, 51·8 per cent. Christians, 1254 males, and 319 females; total, 1573, or ·2 per cent. of the total population: proportion of Christian males to total Christian population, 79·7 per cent. Other denominations, not separately classified—males, 25,454, and females, 24,519; total, 49,973, or 6·5 per cent. of the total population: proportion of males in total unclassified population, 50·9 per cent.

The Musalmáns, according to the Census of 1872, number 72,338 souls, or 9·4 per cent. of the total population, the proportion of males to females being 51·8 per cent. The bulk of the Muhammadans are immigrants from Gayá District, and Islám does not appear to be gaining converts in Hazáribágh. Socially speaking, Muhammadans do not rank high, and most of the influential posts are in the hands of Hindus. A tendency on the part of the Káyasths to adopt the customs, and even to observe the festivals, of the Musalmáns has already

been noticed. In their turn, too, the Muhammadans have formed to many Hindu practices; so that the distinction betwee two religions has ceased to be a marked one. None of the ref ing sects of Islám are represented in the District. The Muhan dans are slow to avail themselves of the English schools, nor they any special educating establishments of their own.

No BUDDHISTS or JAINS are separately enumerated in the C of 1872. There is, however, a considerable Jain populatio mated by the Deputy-Commissioner at 5000 souls. T divided into two classes—the secular and the religious. Jains, known as Saráwaks, are confined to the towns of and Chatrá. Most of them are well-to-do merchants, a high social position. The religious Jains live at the fo náth Hill, and have charge of the temples in the village ban, where pilgrims halt before ascending the sacred classes are well to do in the world. An account of the J ritual, and philosophy is given at the end of this Account.

THE CHRISTIAN population of Hazáribágh District an the time of the Census to 1573 souls—viz., 1254 males, females, being ·2 per cent. of the total population. A Eu regiment was then posted in the station, and the large number of Christians returned is due chiefly to this fact. Christianity in Hazáribágh has gained the bulk of its converts from among the aboriginal races who are engaged in agriculture, and has produced little effect on the pure Hindus or on the more civilised inhabitants of the towns. Two missions are at work in the District—the Chutiá Nágpur Mission, in connection with the Society for the Propagation of the Gospel, which has its head-quarters at Ránchí in Lohárdagá District; and the Scotch Free Kirk Mission at the subdivisional head-quarters of Pachambá. The Hazáribágh congregation of the Chutiá Nágpur Mission is stated in the Report for 1874–75 to comprise 196 persons in all. Of this number, 130 are natives of that part of Lohárdagá District which is known as Chutiá Nágpur Proper, and are employed on the Sítágarhá tea-plantation near Hazáribágh. No missionary or pastor is stationed on the spot, but there is a reader and a schoolmaster, the latter being maintained by the proprietors of the tea-plantation. The rest of the congregation, numbering 66 souls, are Santáls, who live at a distance from the tea-plantation. It is intended to place a reader among them as soon as a man is ready for the work. The congregation is visited once in two months by missionaries from

nchí. A full account of the establishment and progress of the Chutiá pur Mission is given in the Account of Lohárdagá District.

he Free Church of Scotland Mission to the Santáls commenced k in 1869, by opening a school for Santáls at Pachambá, three s from the Girídi Railway station. At the present time (1875) number of converts is 16, comprising 14 Santáls, 1 Kol, and 1 du. The mission staff numbers 21 persons, 3 of whom are opeans. A dispensary attached to the mission distributes medi- atis, and patients who are seriously ill are received into the here is also a training school for teachers, and primary boys and girls. All the pupils are boarders, and both education are given free. It is proposed to extend the opening three other stations, two in the District of Hazá- l one in the Santál Parganás. These will be fixed wherever population is thickest. Pachambá will continue to be the ters. The funds of the mission are drawn mainly from ons in India, aided by the surplus receipts of the Free of Scotland's Institution in Calcutta.

Roman Catholic Mission, which is located at Hazáribágh, stablished chiefly for the benefit of the Roman Catholic soldiers of the regiment posted in the station, and has at no time attempted missionary work among the natives.

The Bráhma Samáj, or reformed theistic sect of Hindus, numbers 20 adherents in the District. Without an exception they are natives of Bengal Proper. Nearly all of them are in Government employ, or hold a respectable position of their own. The Samáj in Hazáribágh was established in 1866. Some of the members are conservative and some progressive. A branch Samáj was established in 1874 as Pachambá.

Division of the People into Town and Country.—The District of Hazáribágh is thinly populated, and society is almost altogether rural. In fact, the three so-called towns are merely collections of villages. The Census Report returns only three towns containing a population of over 5000 souls or upwards—namely, Hazáribágh, population, 11,050; Ichák, population, 8999; Chatrá, population, 8818; total town population, 28,867, or 3·74 per cent. of the total population of the District. Mr C. F. Magrath's District Census Compilation thus classifies the villages and towns:—There are 5780 villages containing less than two hundred inhabitants; 755 with from two hundred to five hundred inhabitants; 133 with from five hun-

dred to a thousand; 27 small towns with from one to two thousa
5 with from two to three thousand; 2 towns with from five to
thousand; and 1 with upwards of ten thousand inhabitants;
number of towns and villages, 6703. The following is a list of
chief towns, with their detailed population, &c., as ascertained by
Census of 1872:—

HAZÁRIBÁGH, the civil station and administrative head-quarter
prettily placed on the high central plateau of the District, in
midst of a group of conical hills. It is situated in 23° 59′ n
latitude, and 85° 27′ east longitude, and has a ge
tion of 2000 feet above sea-level. The soil is
with gravel and sand, and is well suited for the
European vegetables and English flowers and fruit.
as I have already remarked, is little more than a cluster
with intervening cultivation, which have sprung up
military *bázár*, which was the original nucleus. It i
garden (*bágh*) in Hazárí, one of these villages, that th
takes its name of Hazáribágh. From about the year 178c
bágh has been the military head-quarters of the Distri
on the establishment of the South-West Frontier Agency in 1
became also the civil head-quarters. Up to that year, the civil
head-quarters of the District was alternately at Sherghátí and Chatrá.
But from the beginning Hazáribágh was the military station. The
cantonment lies to the south-east of the town, and has a parade-
ground and a rifle-range. The military force stationed in the canton-
ment in 1874 was the 2d Battalion of the 22d Foot. During
that year, twenty deaths occurred in the regiment from an epi-
demic of typhoid fever, a full account of which will be given in
the paragraphs on Medical Aspects; and the troops were ordered
to the North-West Provinces. Since then, the military force
stationed at Hazáribágh has been reduced to a detachment of
the 62d Foot, which is chiefly designed to guard against a
possible outbreak of the prisoners in the European Penitentiary.
Population according to the regular Census of 1872:—Hindus,
males, 4273; females, 2967—total, 7240. Muhammadans, males,
1782; females, 1602—total, 3384. Christians, males, 30; females,
22—total, 52. Other denominations not separately classified, males,
227; females, 147—total, 374. Total of all denominations, males,
6312; and females, 4738—grand total, 11,050. It will be observed
that the male Hindu population exceeds the female, while the

...mán population of both sexes is almost equally balanced. ...difference is probably due to the fact that the Hindu popula... contains a larger proportion of respectable men in official ...oy, who leave their families behind in their homes. In 1871, ...gross municipal income amounted to £469, and the gross ...icipal expenditure to £444. Average rate of taxation, 10½d. ...head of the population.

ICHÁK.—This town is situated between seven and eight miles ...th of Hazáribágh. It is a picturesque, clean-looking place, and ...*arh* or family residence of the Rájás of Rámgarh, a ...g three stories high. The present Rájá, however, does ...chák. In 1871, according to the Census Report, the ...pal income amounted to £253, 16s., and the gross muni... ...diture to £238, 16s. Average rate of taxation, 6¾d. ...f the population. The Census of 1872 disclosed a popu... ...999, as follows:—Hindus, males, 3970; females, 3694—... Muhammadans, males, 625; females, 582—total, 1207. ..., none. Other denominations, not separately classified, ...; females, 62—total, 128. Total of all denominations, ...4661; and females, 4338—grand total, 8999.

CHATRÁ, about 36 miles north-west of the Civil Station, is the chief market of the District. Situated as it is on a comparatively level tract between the central plateau of the District and the tangled mass of rock and ravine which forms its western frontier, in such a way as to command the openings of the passes from the north-west, west and south-west, it is well suited by its position to be the distributing market for the country produce of Palámau and the Tributary Mahals of Chutiá Nágpur. Once a year, during the *Dasahará* festival, a large cattle-fair is held near the town, which is of sufficient importance to attract butchers from Calcutta to buy cattle. The Census Report of 1872 states the gross municipal income of Chatrá as £372, 12s., and the gross municipal expenditure as £337, 12s., giving a rate of taxation of 10⅛d. per head. The Census thus classifies the population:—Hindus, males, 3204; females, 3315—total, 6519. Muhammadans, males, 1030; females, 1166—total, 2196. Christians, none. Other denominations not separately classified, males, 53; females, 50—total, 103. Total of all denominations, males, 4287; and females, 4531—grand total, 8818. The principal articles of import are the following:—Rice, *til*, *sarson*, *surgujiá*, *arhar*, *urid*, *barai*, *makai*, *kurthí*, and *mahuá*

flowers are imported from Lohárdagá District, and the Trib
Mahals of Gángpur, Jashpur, and Sargujá. From the same l
are also brought stick-lac, resin, silk-cocoons, gum, cotton,
unwrought iron. The Districts of Gayá and Sháhábád send w
gram, *masur*, *khesárí*, and similar cereals, as well as turmeric, pep
dhaniá, *lasun*, *rangá*, *jastá*, *katárá*, Gujrátí *elanchí*, and other v
tables. Zinc and tin are also sent in small quantities from th
Districts. Tobacco is imported from Patná. English cloth, *kánsa*
bell-metal household utensils, salt, pepper, and *supárí* or
are imported from Bardwán, Ráníganj, and Calcutta
trade supplies Lohárdagá and the Tributary Mahals
cloth, salt, pepper, tobacco, household utensils, turmeric
Rice, *maruá*, *makai*, *urid*, *barai*, *kurthí*, *mahuá* flowers,
gujiá, *til*, and *ghí*, are sent to Gayá and Sháhábád. Th
mentioned products are also exported to Bardwán and
Patná takes iron and a certain proportion of stick-lac; bu
of the lac which finds its way into the Chatrá market is s
the great lac factories of Mirzápur District.

On the 2d October 1857, a severe action took place a
between H.M.'s 53d Regiment (supported by a detachm
Rattray's Sikhs) and the Rámgarh Battalion, who had mutine
at Ránchí, and were marching with four guns and a large quantity of
ammunition to join Kunwar Sinh at Bhojpur. The mutineers,
posted in great force on the brow of a hill, made a stubborn resist-
ance, but were defeated with a loss of forty men, all their supplies,
and the regimental colours. At this action Lieutenant (now Major)
John Charles Campbell Daunt of the 70th Bengal N.I., and Serjeant
Dynon of H.M.'s 53d Foot, won the Victoria Cross for "conspicuous
gallantry in capturing two guns by pistolling the gunners, who were
mowing down the detachment with grape."

The above are the only towns in Hazáribágh District. Of these,
the two latter, Ichák and Chatrá, as has already been pointed out,
are nothing more than exaggerated villages; and even in Hazáribágh
itself, there is no marked distinction between the population of the
town and that of the surrounding country. Apart from this paucity
of towns, the District is singularly destitute of villages that are
important as seats of trade, fairs, or shrines, or from their historical
interest.

Village Headmen.—The Deputy-Commissioner reports that,
except among the Santáls, there are no *mandals*, village *panchávats*,

is, or ancient village headmen of any sort in Hazáribágh ct. Among the Santáls the *mánjhi*, or *paramánik*, is the village nan. His office is probably not hereditary, but devolves upon elder who by age and experience is fitted for the post, and is ally respected by the community. The *mánjhi* is assisted by dvice of the elders of the village, and without his sanction not ugh is put into the ground or a seed sown. He it is that is put rd to make the arrangements for the lease of the village, and all payments are made. If the lease is taken from him ny but a Santál, the whole community will break up, all ng off to some other Santál village where they can find he early history of Hazáribágh District has been con- g to this result. A Kharwár chief ruled in the large Rámgarh, and aspiring to be considered a Hindu himself, Hindu settlers by giving them villages, as sub-proprietors rs. The same practice prevailed in the northern por- District known as Kharakdihá, where most of the land n *ghátwáli*, or service tenures, by landlords of the e. It is obvious that this system of subletting every ree villages to small under-farmers, or *thikádárs*, must be to the existence of the ancient tribal headmen. The small size of holding enables the farmer to deal with individual *rayats*, thus rendering unnecessary the headman's peculiar function of representing the villagers to their superior landlord. Nor can the *thikádár* tolerate a rival authority in the village, and the old headman sooner or later sinks into the position of an ordinary cultivator. In those villages, however, which are kept under the direct management of the *zamíndár*, a detailed or *ásámíwár* settlement being made with the *rayats*, there are still traces of some communal organisation. It cannot indeed be proved that the *jeth-rayat*, or *maháto*, who is the spokesman of the cultivators in villages thus settled, is the remnant of an ancient institution; but it is probable that the term was imported from Behar, and applied to the existing indigenous headmen. The *jeth-rayat* does not collect rents, and is merely the medium of communication between the *rayats* and the *zamíndár*. He is not paid in cash, but gets his land at two or three ánnás per *bighá* less than his neighbours. The office is not hereditary, and falls naturally into the hands of the sharpest and most influential man in the village. It will only pass to his son if the latter shows himself fitted for the post. The *jeth-rayat* is usually appointed by the

superior landlord after the *rayats* of the village have been con
and can be dismissed by the same authority.

OTHER VILLAGE OFFICIALS.—Besides headmen properly
improperly so called, the following classes of village officia
found in Hazáribágh District:—(1) *Goráit*. The *goráit* is desc
by Mr D. J. M'Neill, in his Report on the Village Watch of Beng
a personal attendant of the *patwárí*, or rural accountant. In H
bágh District there are no *patwáris* except in a few Govern
villages, who have no sort of authority over the *goráits*.
is appointed by the *zamíndár*, from whom he receive
of two or three *bighás* of rent-free land. He is bo
when summoned, at the *zamíndár's* court; and original
was confined to keeping his master informed of all t
the village, with a view to the levy of petty fees on m
similar events. Now, however, the *goráit* is in fact
messenger, and some of the special duties of the *chaukíd*
man, such as reporting crime to the police, have been
him. He is even required to attend at stated intervals a
Circle (*tháná*) in which his village is situated. Only a si
is enumerated in the Census Report. There is, howeve
number of them in the District, and they were probably erroneo
included under the head of *chaukídárs* or watchmen. In Mr
M'Neill's Report of 1866 on the Village Watch, the number of
goráits in Hazáribágh District is returned as 1954. Of this num-
ber, 1631 were in occupation of lands on service-tenure, 199
were paid in cash or kind by the *zamíndár*, and 124 by the
villagers. (2) *Digwárs*. The special function of the *digwár* is to
guard the roads, which in Hazáribágh District have from the earliest
times been peculiarly infested by robbers. He is paid by the *zamín-
dár*, either in cash or by an assignment of land on the roadside. The
average pay of a *digwár* is estimated at from one to two rupees a
month. Of course he supplements this by levying fees from tra-
vellers. In 1839 it was proposed to organise a *digwár* patrol on the
Grand Trunk Road. Inquiries showed that *digwárs* were paid
Rs.9 per annum in cash, and the equivalent of Rs.12 per annum
in land; giving a monthly income of Rs.1-12-0. The consequence
was that they were continually leaving their posts to fetch food from
their houses, as they could not afford to buy from the traders on the
road. The Principal Assistant proposed to give them a fixed salary
of Rs.2-8-0 per mensem, to be paid through the Police Stations or

the extra sum involved being provided by Government. an, apparently, was not carried out. In 1854 the number of s in Hazáribágh District was returned as 134. Mr D. J. ll's Report in 1866 gives a total of 188, of whom 23 were s of land on service-tenures; 143 were paid in cash or kind e *zamíndár*, 16 by the villagers, and 6 by Government. (3) *kidárs*. The duties of a *chaukídár*, or village watchman, in ribágh do not differ materially from those of watchmen in s of Bengal. He is supposed to be a village police- fact a creature of the *zamíndár*, under whom he s land free from payment or at a low rent. In most paid by the villagers, and receives from Rs.2 to Rs.3 The watchmen of Hazáribágh are generally of the , and bear an extremely bad character, both for their ls and for failure to report crimes which come notice. Mr M'Neill's Report returns the number of *aukídárs*) at 1956, 78 of whom hold land on a service- t 210 are paid in cash or kind by the *zamíndár*, and d exclusively by the villagers. The Census Report of nerates 1136; but, for the reasons stated above, this probably includes the *goráits*. (4) *Parganáits* are found in every Fiscal Division throughout the District. From the position they occupy in the Santál Parganás there is some reason to believe that they were originally tribal headmen. But no trace of this can now be discovered in Hazáribágh, and they are now nothing more than land-agents to the *zamíndár* by whom they are appointed.

VILLAGE DISPUTES.—The following account of the modes by which village disputes are informally settled, is derived from the answers to certain questions which the District Superintendent kindly circulated for me among the Sub-Inspectors of Police. It appears that the practices in vogue fall under the three heads of arbitration, ordeal, and solemn oath. The most usual mode of referring a dispute to arbitration is to call a *panchâyat*, or village council. This is not necessarily composed of five persons, but is an irregular assemblage of the caste-brethren of the disputants, one or two elders being *sardárs* or presidents on either side. For the settlement of boundary disputes a *panchâyat* is sometimes appointed by the *zamíndár*, but more often assembles at the wish of the parties who have disagreed. The settlement of a dispute by *panchâyat* is not supposed to debar either of the parties from bringing the question

before a regular court of law, but as a rule both of the dis
acquiesce in the decision of the arbitrators. Among traders
jans), disputes as to money due and matters of account are
settled by a committee of the neighbouring *mahájans*, who inspe
books of both parties and decide what is due; or in the case o
party being insolvent, arrange a compromise at so many ánnás i
rupee. This committee, however, is in no way connected wit
village system, and is not usually called by the name *pancháyat*
Santál villages the headman (*parámánik* or *parganáit*) is
referred to, and there seems to be no appeal from hi

There are still to be found in the more remote p
bágh remnants of an old system of ordeals. The re
say that ordeals are seldom resorted to, except when
accused of unchastity or loose behaviour, and even o
sions have fallen into disuse since the institution of B
But such accusations are frequently made, and from
the case cannot be brought before a Court, so that I con
are not altogether extinct. The commonest form of t
be this:—Two balls of equal size are made by a Br
calf's dung, a four-ánná piece being enclosed in one, and
charcoal in the other. Both are placed in the woman's a
under a *pípal* tree. She is then solemnly brought to the spot and made to choose one or the other. If she selects the ball containing the four-ánná piece she is cleared; but if she gets the charcoal she is held guilty, and punished by exclusion from caste. By another mode of ordeal, the woman charged with misbehaviour is required to take a coin with her bare hand out of a pot of boiling oil or *ghí*. If she succeed in taking out the coin, she is declared innocent; if she fail, she is dealt with as guilty. It would seem, however, that this test is intended to be a punishment in itself, and is only applied in cases where the suspicion of unchastity is very strong. The forms of oath in use are extremely various. The most peculiar is that in use among some of the aboriginal tribes, which is sworn on a tiger's skin, the name of the supreme god, Sing Bongá, being invoked at the time.

THE MATERIAL CONDITION OF THE PEOPLE: CLOTHING, FOOD, &c.—The establishment of the railway, and the extensive operations of the Public Works Department, have caused of late years a great demand for labour, and a consequent rise in the price of wages and produce, which has considerably ameliorated the condition of the

eople. In former years, a labourer or petty agriculturist could arcely manage to supply himself with the bare necessaries of life; ile in bad seasons, or on other occasions of distress, his misery was great. Now, however, after defraying all his expenses, he can ge to save something out of his earnings or the produce of his , which he carefully hoards up for occasions of sickness and ns of scarcity, or, as is oftener the case, to spend on wedding onies and other festive occasions.

ry dress of a well-to-do shopkeeper generally consists of or waistcloth, wrapped round the loins and falling far as the knee; a cotton *chádar* or shawl, which serves for the upper portion of his body; a cotton *mirjái* or cotton *pagri* or turban; sometimes a *topi* or cap covering d. a pair of country shoes. A common husbandman *m dhuti*, of coarser materials, a *barki*, or double sheet, a mall *chádar*, which is converted into a head-dress, and turban when at work in the fields; few husbandmen to wear shoes. The building materials of a well-to-do generally consist simply of earth and posts, with a tiled s habitation usually comprises from three to nine storied ms, with a shed or large verandah outside for the reception of visitors. The homestead is surrounded by an enclosure. The cost of building would be about Rs. 300 (£30). The furniture usually met with in such a house consists of several sorts of iron, brass, or l[illegible]ctal (*kánsá*), utensils for cooking, or for eating and drinking from; some earthen pots, also for cooking; one or two earthen water jars; a few wooden or rattan stools and mats; one or two *chárpáis*, or cord-bedsteads for sleeping purposes; a *haroká*, or a basket with lid of the same materials for keeping clothes; an *ukhli* and a *sámat*, or wooden pestle or mortar, for cleaning rice and pulses; a *jántá*, or grindstone; a *silát* and a *lorhá*, or stones for grinding spices and pulses; a *cháini*, or sieve; a *sup*, or winnowing fan; and a *barhni*, or broomstick, &c. The dwelling of an ordinary *rayat* is built of the same materials as that of a well-to-do shopkeeper. But the house itself is smaller and less substantial, being composed simply of mud, straw, and bamboos; it usually consists of two or three rooms. The general cost of such a dwelling is about Rs. 10 (£1), though the houses of the more prosperous class of agriculturists sometimes cost as much as Rs. 100 (£10) or upwards. The furniture, if such it may be called, of a peasant consists simply of a few brass and earthenware vessels, a stool or two, and

a few bedsteads or mats for sleeping on. The shopkeeper lives on ric
pulses (*dál*), clarified butter (*ghi*), curries, milk, sweetmeats, &c. T
food of a *rayat* consists of much the same articles, eked out with ma
millet (*maruá*), and the flowers of the *mahuá* tree (Bassia latifo
which he gathers for himself in the jungle. This use of the *m*
blossoms as an article of food is, I believe, peculiar to the
tribes of Western Bengal. The living expenses of a well-to-do
keeper are estimated to amount to from Rs.20 to Rs.25 (£2
10s.) per month, and of a cultivator from Rs.10 to
£1, 10s.) per month. This latter estimate seems hig
the scale of living of a prosperous agriculturist th
peasant. Very few of the cultivating classes make m
Rs.7 to Rs.8 (14s. to 16s.) per month out of their fields.
remembered, too, that a husbandman produces himsel
portion of what is required for his support. The figures a
represent what would be the cost of living, provided tha
had to be purchased in the *bázár*.

The account just given of the ordinary *rayat* is take
Deputy-Commissioner's Return. It describes accurately t
whose condition lies midway between the extremes of w
poverty that are found among the agricultural class. But look
to the fact that the bulk of the peasants are very poor, while the
position of the wealthier agriculturists is peculiar, and contributes
largely to keep the poorer peasants from rising in the world, I add
the following account of the two extremes of the class, based on
a special note furnished me by the manager of the Dhanwár estate.
An ordinary peasant of the poorer sort holds on the average from
one to five *bighás* of *bád* or inferior rice-land, with about one *bighá*
of *singá*, which is slightly better, though not the best, a *bighá* of *bárí*
or homestead land, and some *tánr*. His property consists of a
plough and one or two oxen, a few goats, and, if he is fortunate, a
cow. He lives in a thatched hut, containing one or perhaps two
rooms, measuring fifteen feet by ten; and his household furniture
consists of a small bed, a few cooking utensils, some brass cups and
plates, and a *dhenkí* or pedal for husking rice. The large majority of
the class are hopelessly in debt to their *mahájan*, and, knowing that
they have no chance of ever getting clear, evade payment by every
means in their power. They are rack-rented to the utmost extent that
the competition for land will admit of, and are not educated enough
to derive any benefit from the occupancy provisions of Act X. of 1859

The well-to-do cultivators, though numerically very few, can readily be distinguished from the poorer peasants just described. It is from these men that *thikádárs*, or small village farmers, and the rural *mahájans* are drawn. A man of this class will live in the best and perhaps the only high-tiled house in his village; own the best lands, cultivate them with the strongest cattle. He has *kamiás* or bondsmen under him, whom he maintains only from March to December. Notwithstanding that many of them have considerable wealth in money and in stores of grain, they are as a rule unwilling to live in very little comfort. They seldom found a family as soon as they have risen high enough in the social scale to make the personal management of their affairs, their wealth and their children, and their descendants fall to the position from which their forefathers originally rose.

PILGRIMAGES.—Besides the annual pilgrimage to Párasnáth Hill, which will be fully described in the Account of the Jains, there is frequent the Kulha Hill in *parganá* Dantárá, sixty miles south of Hazáribágh, on the tenth day of the months of April and May. There is a temple and tank on the summit, dedicated to Kulheswarí, "the goddess of the hill;" votaries sacrifice goats or buffaloes, offer sweetmeats in the temple, and bathe in the tank. Although the festival is now observed by Hindus, it can hardly be doubted that this worship of a hill-deity has been derived from the aboriginal races, who at one time were settled in great force in this part of the District. The average number of persons who attend on the days of pilgrimage is estimated to be about 3000. Another place of pilgrimage is Kháprawá, about two miles from Hazáribágh, where about 600 persons go on the full moon of the month Kártik (October—November), to celebrate the festival of Nar-Sinha, the fourth incarnation of Vishnu. I take the following account of the incarnation of Nar-Sinha from Garrett's *Classical Dictionary of India*, p. 418, where it is quoted from the *Vishnu Purána*:—"One of the two doorkeepers of Vishnu's paradise came down to earth as a monarch, named Hiranyakasipu. He was cruel, tyrannical, unjust; particularly so towards his son, named Prahlád. But he had obtained from Brahmá, by severe penance, the boon that he should not be slain by any created being; in consequence of which he became very proud, and required all persons to honour him by saying, '*om hiranya*' (Adoration to Hiranya); and those who would not say so, he ordered to be punished. His son Prahlád, who

was a devout worshipper of Vishnu, would not obey his father's order, but continued to say, '*om namah*' (meaning by Om, Vishnu). Hiranya remonstrated with him because of this, but in vain. Then he attempted to punish and kill him, but in vain: Prahlád was struck heavily, but did not feel the strokes; he was cast into the fire, but was not burnt; he was trampled on by elephants, but continuing to think of Vishnu, he was not hurt; he was thrown fettered into the sea, but a fish carried him safely to shore. At last, when Prahlád did not cease praising Vishnu, and asserted that he was [illegible] and in everything, Hiranya retorted, 'If so, why dost thou not show him unto me?' Upon this, Prahlád rose and struck at a pillar in the hall in which they were assembled; and, behold, therefrom issued Vishnu, in a form which was half-man and half-lion, and tore Hiranya to pieces."

Conveyances, &c.—Until late years the only form of conveyance in use was the *sagar gárí*, the wheel of which is rather more than two and a half feet in diameter, and has no spokes, but is made by joining three pieces of solid wood axe-hewn out of the *sál* or *mahuá* tree. The ordinary price of a *sagar gárí* is only Rs.10, and owing to the large amount of wood wasted in cutting, a full-size trunk will not furnish more than one set of wheels. Teak wood is never used, as trees of the requisite size are rare, and would fetch at least Rs.50 (£5) as rough timber. The *sagar* will carry about five *maunds* if well packed, and being low and narrow between the wheels is well suited for conveying timber, and for rough work on jungle tracks. Within the last twenty years, small two-bullock carts, carrying about twelve *maunds*, have come into use on the roads to Girídi, Barákhar, Chatrá, and the open part of Gayá District. Before this time, however, commanding officers of regiments about to march through the District were formally warned by the Governor-General's Agent, that they must bring their means of transport with them. Pack-bullocks are not much used for the local traffic, though the bulk of the import trade is conducted by their means. They carry a load of two *maunds*, and their ordinary day's march is from six to eight miles.

Agriculture: Soils.—For all agricultural products, except rice, the soil of Kharakdihá, or the tract of country lying north of the Barákhar, is inferior to that of Rámgarh. In Kharakdihá, indeed, the hollows that lie between the long undulations of the surface are full of rich, alluvial soil, into which abundant vegetable mould has been

washed. The dip of these hollows, too, is well suited for storing and distributing the water supply that drains off the face of the country. But the crests of the ridges are, as a rule, very poor, being made up of sterile gravel lying on a hard subsoil, which is only irrigable by elaborate system of lifts, and which yields, even to irrigation, but meagre return. In Rámgarh, on the other hand, the subsoil is t and open, and the surface is composed of a very good ferrugi- loam; while many of the low hills are coated with a rich dark -ould. This, though hardly adapted for rice, forms an l for the cultivation of cotton or tea.

LAND.—It has been remarked above that the surface district is composed of long undulating ridges, between ainage runs off to join the large streams. The lower se ridges, and the swampy ground between, supply the which a rice-crop can be raised. The soil is, in the first ught under cultivation by cutting level terraces out of , a small bank to hold water being left round the edge of The hill-sides thus present the appearance of a series of ing from one to five feet in height; and when the slopes eep for terracing or the soil too stony for cultivation, the of the stream is banked up and made into one long narrow rice-field. The rice-terraces are flooded as soon as possible after the rains set in, and the water is retained until the crop ripens in late autumn. After the crop has been reaped, the higher levels become dry and hard; but the lower fields often remain so muddy until February and March, that they can only be crossed on foot along the edges of the terraces.

The rice-fields (*dhán-khet*) thus constructed are divided as follows into four classes, having regard to the height of the land, and its capacity for remaining moist until the season for planting out:—(1) *Gairá*, the rich alluvial land which lies lowest in the trough or depression between the ridges, and which from its position receives all the vegetable mould washed off the slopes. The rent of *gairá* ranges from Rs.2-8-0 to Rs.3 per local *bighá*, or 6s. 8d. to 8s. per acre; and the average yield is estimated to be 16 *maunds* per *bighá*, or 15 hundredweights per acre. The very best *gairá* land, when it is so situated as to retain moisture the whole year through, is called *bayár*. (2) *Singá* lies higher up the slope than *gairá*, and remains dry during a longer period. A rent of Rs.2 per local *bighá* or 5s. 4d. per acre is paid for it; and the average produce of a *bighá* is about

12 *maunds*, or of an acre nearly 12 cwts. (3) *Bád*, again, is situated above *singá*, and is the highest land on which rice can be grown at a profit, without artificial irrigation. The rent paid varies from R.1 to R.1-4-0 per *bighá*, or from 2s. 8d. to 3s. 4d. per acre, and the produce is estimated at 7 *maunds* per *bighá*, or nearly 7 cwts per acre. (4) *Gaurhá* is rather high rice-land, which would, from its position, be classed as *singá*, but which catches the fertilising drainage of a village, and is therefore assessed as *gairá*. The rent and the average produce are the same as in the latter. It is not the practice to grow a second crop on rice lands, but I am informed, however, that there is no reason why the winter rice should not be followed by *but* (gram) or *tisi* (linseed).

On the higher slopes, and on the tops of the ridges, are grown wheat and other cereals, with pulses, fibres, and miscellaneous crops. This high land, generally known as *bhítá*, is classified as follows: (1) *Bárí* or *gharbárí*, the highly-cultivated and well-manured homestead land which is situated close to a village. It is suitable for such crops which require careful husbandry and night-watching, and is assessed at Rs.2-8-0 per local *bighá*, or 6s. 8d. per acre. It is usually sown with Indian-corn. (2) *Báhir-bárí*, also known as *kanárí*, is situated farther from the village than *bárí*. It cannot be tilled so carefully or supervised so fully as *bárí*, and consequently is assessed at only one rupee per *bighá*, or 2s. 8d. per acre. The characteristic crop of *bhítá* land is *maruá*. (3) *Tánr* or *tánrí* is the barren land which forms the top of the ridges. It is usually planted with some crop, such as *kodo* or *surgujiá*, which does not require much looking after. (4) *Tarrí* or land on the banks of rivers. This has been described above in the paragraph on River Banks (p. 40), and it is only necessary here to note the rate of assessment, which is Rs.2-8-0 per *bighá*, or 6s. 8d. per acre.

The classification of land detailed above prevails almost universally throughout the District. The rates of assessment, however, hold good only for those lands which are administered on the system adopted for Government estates. By far the larger part of the District is still managed on what may be called the old or indigenous system. Under this the several varieties of rice land are not separately assessed; but a consolidated rate, ranging from Rs.3 to Rs.5 per *bighá*, or from 8s. to 13s. 4d. per acre, is charged on all the rice land in a village as such. The rent having thus been fixed, a certain amount of upland is allotted without further charge to each tenant,

in proportion to the quality and quantity of the rice-land and to the position and fitness for cultivation of the upland. The rice-fields, on which the allotment of the village holdings is thus made to depend, [illegible]e sometimes called the *jíban* land of the village; and the cultivator, defining his own status, will speak of himself as a *jíbandár*. By [illegible]is, he means that he is entitled to hold not any specific plot, but a [illegible]in proportion of the village *jíbán* or rice-land, carrying with it [illegible]a varying amount of upland. He will, moreover, actually [illegible]lding every two or three years, always cultivating about [illegible]ntity of land, but displaying no attachment to a par- [illegible]I cannot discover any definite rules which govern this [illegible]nifting cultivation; but it would seem to be a remnant [illegible]ice of periodical redistribution of "shifting severalties" [illegible]acteristic of all early agricultural communities.

[illegible]LTIVATION.—The three principal crops of rice grown in [illegible] District are *borá* or *gorá*, *lahuhan*, and *jarhan*. *Borá* or [illegible]s sown broadcast on *tánr* land after the first fall of rain in [illegible]is reaped about the end of August. This crop is confined [illegible]thern portion of the District known as Rámgarh, though [illegible]ppears to be no reason why it should not be grown in Kharakdihá as well. *Lahuhan* or autumn rice is sown in June on *bád* land, and reaped in September. It is either transplanted or sown broadcast. The coarser varieties of rice, such as are used by the poor, are usually grown in the *lahuhan* crop. The winter rice-crop, called *jarhan*, is sown in a nursery in June, transplanted in July or August to *gairá* land, and reaped in October and November. From this crop are derived the finer varieties of rice, in use among the higher classes of natives.

Owing to the scanty rainfall of the District, there is no systematic preparation of rice-land for the crop. A well-to-do cultivator, who owns plenty of cattle, will probably plough over his land when it is soft from the Christmas showers. But the practice is not universal; though most *rayats* will admit, if questioned on the point, that the more the land is worked before sowing the better crop it will yield. The Deputy-Commissioner gives the seventeen principal varieties of *lahuhan* rice as follows:—(1) *ráichuni*, (2) *chandragalir*, (3) *tilásár*, (4) *katiká*, (5) *mehrá*, (6) *karhani*, (7) *gorá*, (8) *bansjohul*, (9) *rás*, (10) *sáthi*, (11) *jaungá*, (12) *lohchi*, (13) *báki ras*, (14) *jhingá sál*, (15) *barú mugáhi*, (16) *mahádeo put*, (17) *bak pánjar*; and the thirty chief varieties of *jarhan* rice as follows:—(1) *sítá bhog*, (2) *bánsmati*, (3)

kanaudí, (4) *prasád bhog*, (5) *rájnat*, (6) *sudiná*, (7) *ratgoli*, (8) *murdhi*, (9) *peaugh*, (10) *pánsál*, (11) *sital chini*, (12) *syám jirá*, (13) *nainkájar*, (14) *tilká chand*, (15) *lohuri*, (16) *matí chur*, (17) *kásí phul*, (18) *jháhar*, (19) *kárpur sál*, (20) *lakshmí-bilás*, (21) *dulangi*, (22) *kanud*, (23) *charnakhí*, (24) *narchá*, (25) *dhusri*, (26) *rámdí*, (27) *bhandrás*, (28) *rudní*, (29) *rámkel*. (30) *runiá pauk*.

THE QUALITY OF THE RICE continues the same as it was ty years ago, although an attempt was recently made to int Carolina paddy. Experiments were made for thr seasons on the Dhanwár estate, but failed for wa tinuous supply of water. A kind of rice is also grown which bears a strong resemblance to acclimatised Caro was bought at an auction sale from some *rayat* who the seed from Calcutta, and its history cannot be traced back. The out-turn from it is good, but the natives thir to many sorts of indigenous rice. The following table results of the experimental growth, under the supervis manager of the Dhanwár estate, of the chief varieties of in the District :—

STATEMENT SHOWING THE DIFFERENT KINDS OF RICE SOWN I... FIVE DHANWÁR FARMS FOR THE YEAR 1873–74, WITH THE RESULT OF EACH.

Name of *dhán* (paddy).	Amount of *dhán* seed.	Amount of out-turn.	Remarks.
	Md. Ser. Ch.	Md. Ser. Ch.	
Carolina, . .	0 10 2	1 10 10	5 fold.
Pán sál, . .	29 10 0	137 0 0	5 ,,
Purbí sál, . .	93 6 6	599 33 6	6 ,,
Karpur sál, .	1 0 0	4 0 0	4 ,,
Sital chíní, .	20 13 8	93 27 0	5 ,,
Karhaní, . .	2 1 0	12 10 0	6 ,,
Murdhá, . .	105 16 0	598 5 0	6 ,,
Jaungá, . .	5 4 0	14 25 0	3 ,,
Paung, . .	38 14 0	219 2 0	7 ,,
Rángi, . . .	5 25 0	35 0 0	7 ,,
Dhusrí, . .	13 11 0	83 20 0	7 ,,
Táljhántí, . .	4 0 0	15 0 0	4 ,,
Chandragalin,	1 20 0	11 30 0	8 ,,
Ajáu, . . .	23 22 0	76 30 0	4 ,,
Sití sár, . .	12 0 0	200 0 0	17 ,,
Gohmá, . .	12 0 0	61 10 0	5 ,,
Karí bánk, .	5 30 0	81 12 0	16 ,,
Total, . .	372 23 0	2244 15 0	6 average.

e total quantity of rice raised throughout the District has of late s increased, and new lands are continually being brought under tivation. A *rayat*, as a rule, sells his rice-crop, and pays his rent nd makes his necessary purchases with the price, while he and his mily live on the produce of the high land.

AMES WHICH RICE TAKES in the various stages of its growth tion are as follows:—*Bihan*, the seed; *ankur*, the germ; *rí*, the seedling when ready for transplanting; *áraudhá*, lant in flower; *dhán*, unhusked rice; *chául*, husked rice; ed rice.

ONS MADE FROM RICE.—The following are the principal nade from rice in Hazáribágh District:—*Arwá chowá*, steeping fine unhusked rice (*arwá*) a night in water, nd then beating it flat. It is sold at 1½ ánnás per *ser*. is coarse unhusked rice (*usná*) boiled for an hour, dried, . It is then heated and beaten flat, while still hot. It is ánná per *ser*. *Murhí* is made from boiled rice, afterwards y shaking it up in a vessel with heated sand. *Láwá* is ed and mixed with *chowá*, the dregs left after making . *Pithá* or *kálí* is a hard ball of pounded rice with a small quantity of molasses (*gur*) in the middle. *Hándiá* is made by boiling rice in a little water, so as to burn the layers at the bottom. It is mixed with *ránu*, a compound of various roots found in the jungles, and is fermented for three or four days before being strained off for use. It is sold at 1½ ánnás per *ser*.

OTHER CEREAL CROPS.—The other cereal crops grown in Hazáribágh District are as follow:—*Goham* or wheat is sown on high land in September and reaped in March. *Tarrí* or river-bank land is largely planted with this crop, which is irrigated three times during the year. In 1848, the Principal Assistant returned the amount of wheat-growing land in the District at 5544 *bighás* 10 *káthás*, producing 35,283 *maunds* 5 *sers* per annum. The varieties grown were, *dáudí* or *dudhiá*, white wheat; *harhá*, yellow wheat; and several red varieties known as *jamálkaní*, *singu*, *jogiá*, *dakhiná*, and *kewálí*. Of these the white wheat was finest, but the red was said to be most nutritious. The average produce of all sorts per *bighá* was 6 *maunds* 14½ *sers*. *Dáudí* wheat was sold at 1 *maund* 2 *sers* per rupee, and *harhá* or yellow wheat, together with the various kinds of red wheat, at 1 *maund* 5 *sers* per rupee. The cost of exporting wheat to Calcutta was estimated at 1 rupee per *maund*. I am unable to discover how

this estimate was arrived at; but the minute detail into wh
enters, and the fact that about this time the Court of Directors
calling for information on area and out-turn of crops, lead me
infer that it was to some extent based on actual measurement. *Ja*
or barley is treated in much the same manner as wheat. It is sow
on high land, or on *tarrí* land, in September and Octo
reaped in March and April. *Makai*, Indian corn (Z
sown in May and June on *bárí* land, and reaped in
September. Two varieties are grown, the red and wh
corn is the staple food of the lower classes for six m
year. When parched and ground into flour it is calle
eaten with sugar: when simply ground it makes a kin
known as *lapsi* or *gathá*. *Janirá*, a species of cereal
May and June on *bárí* land, and reaped in September a
Maruá, sown in June on *bárí* land, transplanted in July, a
August and September. *Gondlí*, sown on *tánr* land in
reaped in October and November. *Kodo*, sown on the san
land and cut at the same season as the above. *Kodo* is or
in Rámgarh, and is unknown in Kharakdihá. *Sáwán*, sow
land in June, and cut in August.

PULSES AND GREEN CROPS, locally known as *dálihan*. *Ch*
gram (Cicer arietinum), sown on *bárí* and *bád* lands in September
and October and cut in March. *Matar* or peas (Pisum sativum), the
seasons of sowing and reaping are the same as the foregoing. *Khes-
árí*, sown and reaped at the same seasons as the above, but grown
on *gairá* or moist land. *Masuri* (Ervum lens), sown in September
or October on *bárí*, *bád*, or *singá* land, and reaped in March.
Mug (Phaseolus mungo), sown on *bárí* land in June and July, and
reaped in September. *Mothí*, sown in July on high land, and
reaped in November. *Kurthí*, sown on *tánr* land in September,
and reaped in November and December. *Urid*, or kidney bean
(Phaseolus Roxburghii); of this there are two sorts — *aghaniá*,
sown on *bárí* land in August and reaped in November; and *kálá*,
sown on *bárí* land in June and July and reaped in September.
Rahar (Cytisuscajan), sown on *bárí* land in July, and reaped in
November. An inferior crop is also grown on *tánr* land. *Barait*,
sown on *bárí* land in July, and reaped in September. *Rám rahar*,
sown on *bárí* land in June and July, and reaped in October and
November. *Ghangrá*, sown on *bárí* land in July, and reaped in
November.

OIL-SEEDS.—The oil-seed crops grown in Hazáribágh District are the following:—*Tísí*, linseed (Linum usitatissimum), sown on *bár* or *bád* land in September or October, and reaped in March. *Rái* or *sarisha*, mustard (Sinapis dichotoma), sown on *bárí* land in October, and cut in February. Three varieties are grown, the white, brown and black. *Til* (Sesamum orientale), sown in August and September on *tánr* land. *Surgujiá*, sown in July and August on *tánr* land, and reaped in November and December. *Rerí*, castor-oil plant (Ricinus communis), sown in September and October on *bárí* land, and reaped in February and March. All the foregoing are exported either in the form of raw produce or of oil to Bardwán and Calcutta, by way of the Girídi railway station.

FIBRES.—The following fibres are grown to a small extent in Hazáribágh: (1) *Pát, patuá*, jute (Corchorus olitorius), often inaccurately called *san*, sown on *bárí* land in June and cut in September. produce is used locally, and exported in small quantities to Cal- (2) *San*, flax (Crotolaria juncea), sown and cut at the same as the foregoing, is grown only for local use. (3) *Kudrum*, n June on *bárí* land and reaped in September, used to make (4) *Murabá* or aloe, is used for making ropes and rough ags. It is steeped in water till it rots, and then beaten to separate the fibre, which is twisted into twine with an ordinary spindle. (5) *Chob*, the bark of the climbing *mohnár* (Bauhinia scandens) is twisted into rope, and used for fastening roofs and for thatching.

VEGETABLES.—The principal vegetables produced in the District are the following:—*álu* or potatoes (Arum campanulatum), sown on *bárí* and *tarrí* land in September, and the tuber dug up in January. *Badi*, sown on *bárí* land and reaped in October. *Simí*, planted on *bárí* land in July and gathered in December. *Simá*, planted on *bárí* land in June and gathered in September. *Pekchi* (Arum colocasea), a species of yam planted on *bárí* land in June and gathered in February. *Sakarkand* (Convolvulus battatas), planted on *bárí* land in September and dug up in November and December. *Gajrá*, sown and gathered at the same seasons as the foregoing. *Báigun* or fruit of the egg plant (Solanum melongena); the seed is first sown in a nursery near the house of the cultivator in June, the young shoots being transplanted a month later into a field previously well ploughed and manured, and planted in rows two or three feet distant from each other. The plants soon grow into shrubs about two feet in height, and begin to yield produce from October to

about the following March. *Konhrá*, a kind of gourd (Cucurbita pepo), and *kaduá*, or pumpkin (Cucurbita lagenaria), planted on *ghar-bárí* land in June and gathered in December. *Khirá*, or cucumber, planted on *bárí* land in June and gathered in August. *Karelá*, a description of gourd (Momordica charantia), used as a vegetable with curries; it has a rather bitter taste; planted on *bárí* and *tarrí* lands in February and gathered in May. *Jhingi* (Luffa acutangula) and *ninuá*, a cucurbitaceous plant (Luffa pentandra), planted on *ghar-bárí* land in June and gathered in August. *Kanda*, planted on best *bárí* land in February, and gathered in September and October. The other vegetables produced in the District are the following:—*Pálang* (Beta Bengalensis), and *gándhárí* (Amaranthus lividus), grown in the cold weather.

Fruit-Trees.—The principal fruit-trees in the District are the following:—Mango, peach, guava, lime, *papaya*, custard-apple, *bel*, palm, tamarind, and small date. Three varieties of blackberry found—the largest of which is called *falendá*; a smaller, *jámun*; third, very small, *katjámun*. *Tarmuj*, or water-melon (Cucurbitrullus), is produced in the hot season. *Phutí* (Cucumis momo) cultivated in the hot season. River beds are said to be well s for its growth. The fruit in its ripe state is called *phut*, and whe green, *kákri*.

Miscellaneous Crops.—*Ketárí* or *ákh*, sugar-cane (Saccharum officinarum), planted from cuttings in February or March on the best *bárí* land, and cut in November or December of the next year. In 1837 the Principal Assistant, in reporting on sugar-cane cultivation with reference to a proposed extension of 6 and 7 of William IV. Cap. 26, stated that only small patches of a stunted variety of cane were grown in *parganás* Chai and Dantárá. By 1847, however, the land under sugar-cane cultivation had increased to 23,10½ *bighás*, yielding a total produce of 182,478 *maunds* of molasses (*gur*), or 7·89 *maunds* per *bighá*. Assuming 1½ ánnás per *ser* as a fair average price for *gur*, these figures would show Rs. 29-9-4 per *bighá*; or £8, 17s. 6d. per acre. The variety of cane grown is somewhat smaller than that known in Bengal, but it suits the soil and is considered a profitable crop. *Aphim* or *posta*, opium, sown in September and October on the best *bárí* land, and cut in February and March. The crop is manured, irrigated, and carefully weeded. *Pán* (Piper betel) is sown on moist land in May, and gathered in the following March. It is transplanted, and the crop requires to be well irrigated.

Kapás, cotton, sown in July and cut in November, is only grown for local consumption. In 1848 the Principal Assistant reported, in answer to the inquiries of the Court of Directors, that the area of land under cotton cultivation was about 4080 *bighás*, the average yield per *bighá* being 1 *maund* 35 *sers* of cotton. The raw cotton was bought from the *rayats* by small dealers at 14 *sers* for the rupee. Four *maunds* of raw cotton yielded 1 *maund* of clean cotton at a cost of 12 ánnás for cleaning; and the cleaned cotton was sold in Chatrá market at 3 *sers* per rupee. The expense of carriage to Calcutta was estimated at Rs. 1-11-7 per *maund*. Besides the ordinary mode of growing cotton described above, a practice also prevails of burning the jungle on uncleared land, and sowing cotton between the stumps. In the first two years a fine crop is obtained, and an indifferent one in the third. After the third year the land is abandoned. This *júm* mode of cultivation is described in the Account of Lohárdagá District.

AREA: OUT-TURN OF CROPS, &c.—Hazáribágh District has been twice surveyed, first by the Revenue Surveyor between 1858 and 1863, and again topographically between 1870 and 1873. Its area as ascertained by the Topographical Survey amounted to 4,492,800 acres, or 7020 square miles. Of this area 1,654,400 acres, or 2585 square miles were returned as under cultivation; and 2,838,400 acres, or 4435 square miles, as uncultivated. No return was made by the more recent Survey of the amounts of cultivable and fallow land, or of uncultivated waste, such as rock and jungle. The Revenue Surveyor reported 1,318,909 acres, or 2060·79 square miles, to be cultivated; 2,940,457 acres, or 4594·46 square miles, to be cultivable; and 233,953 acres, or 365·55 square miles, to be barren waste. There is some reason to believe that these figures are not entirely accurate. Owing to the nature of the country, it is in many cases difficult to say whether a given plot of land is cultivable or not; and steep slopes which have the most sterile appearance, are frequently terraced into rice-lands. The Deputy Commissioner reports that no means exist of forming an accurate estimate of the acreage under the different crops. The average produce of a *bighá* of land has been given above.

CONDITION OF THE CULTIVATORS.—A holding of fifty *bighás*, comprising thirty *bighás* of rice land and twenty of upland, would be considered a large farm; and anything below fifteen *bighás*, a small one. A fair sized comfortable holding for a husbandman cultivating his own lands, would be a farm of about twenty *bighás*, containing twelve

bighás of rice land and eight *bighás* of upland. Many cultivators, however, hold far less than fifteen *bighás*, and supplement, by working for wages, the small profits they derive from their land. A single pair of oxen cannot plough more than eight *bighás*. The Deputy Commissioner estimates that a small holding of fifteen *bighás* will make a peasant better off than a respectable retail shopkeeper in a village, and will enable him to live as well as a man earning Rs.8 (16s) a month in wages. A moderate-sized household could be comfortably supported on Rs.15 (£1, 10s.) a month. The mere fact that what has been termed slave-labour continues to prevail in full force in the District, shows that the condition of the cultivating classes can not have materially improved of late years. Although the prices of all kinds of agricultural produce have risen, the cultivators have not shared in the benefits resulting therefrom. It is clear that this is due not to the Government demand for revenue, which is exceptionally light, nor even to the direct action of the *zamíndárs*; but to the practice of sub-letting two or three villages to small farmers (*thikádárs*), who hold on a short lease and make the most they can out of the cultivators' rents. It is true that there has been no general and formal enhancement of rents under Act X. of 1859; but the *thikádárs* are everywhere working to raise rents, and the *rayats* are at present too ignorant to think of taking legal proceedings in their own defence. No class of small proprietors is found in the District, who own, occupy, and cultivate with their own hands hereditary estates.

Cesses or Abwábs.—The following list of the principal *abwábs* or miscellaneous cesses, which are paid by cultivators or subordinate tenure-holders to their superior landlords, was supplied to me by the manager of the Dhanwár estate. It does not appear that every *rayat* pays the entire number, but I give the complete list in order to show the variety of pretexts under which occasional contributions are levied by the landlords. (1) *Battá*, a charge of one ánná in the rupee in consideration of the difference between the old *sikká* rupee and the present coin; (2) *pujá*, a charge of one ánná per rupee for keeping up the family-worship; (3) *dasturí*, one ánná per rupee levied by the landlord's *ámlá* or officials, when any payment is made. The *diwán* or steward takes half of the proceeds and the balance is divided among his subordinates; (4) *darsaní*, levied from all tenants when they visit the *zamíndár* at the *Dasahará* festival. A *thikádár* or small farmer will pay one or two rupees, and a peasant from two to four ánnás; (5) *rasum ámlá*, a cess of one rupee for a *thikádár*,

and from two to four ánnás for a peasant, collected at the end of the year for the benefit of the landlord's subordinate officials; (6) *salámi*, a complimentary payment, of varying amount, made when a fresh lease is granted to a farmer, or a fresh settlement concluded with a *rayat*, (7) tithes of *ghí*, *dahí* curds, *kondhi tel* oil made from the seed of the *mahuá* tree, *rui*, cleaned cotton, *kapás*, raw cotton, *urid*, *dánd*, poppy-seed, *makai*, Indian corn, are levied when these crops are gathered in; (8) *fárkhatti*, properly *fárigh khatti*, is paid when receipts for rent are given at the end of the year, at the rate of one rupee by farmers, and from two to four ánnás by cultivators; (9) *bchri ghatwe*, a cess levied from both farmers and cultivators for the pay of the *ghátwáls* or jungle police kept up by the *zamíndár*; (10) *shádi mángan*, when a marriage takes place in the *zamíndár's* family, half of the expenses of the ceremony is levied from the tenants of the estate; (11) *mandochá*, a fee of eight ánnás is charged for every marriage in a *rayat's* family; (12) *karochá*, a half share of the price of the young buffaloes sacrificed at the *Dasahará* festival is charged to the *rayats* of the estate; (13) *nochá*, where rent is paid in kind, a cess of one *ser* per *maund* is levied to pay the watchman (*chaukidár*), messenger (*goráit*), and other village servants; (14) *manseri* is a similar cess of one *ser* per *maund* for the village accountant (*patwárí*), landlord's bailiff (*gumáshtá*), and under-bailiff (*baráhil*), where such officials exist; (15) *gashti*, a complimentary payment of one rupee, with presents of rice, *dál*, *ghí*, &c., made to the landlord when he goes on a tour of inspection in his estate; (16) *sonárá*, when rent is paid in kind a tax of a quarter of a *ser* per *maund* is levied for the trouble of weighing. It is divided equally between the landlord and the servant who weighs the grain; (17) *kharid mángan*, when a landlord builds a new house, or buys an elephant, his tenants are called on to contribute one quarter or one half of the price, under the name of *kharid mángan*; (18) *ghamí mángan*, a cess of a quarter or a half of the funeral expenses, levied on the death of any member of the landlord's family; (19) *paidáish mángan*, on the birth of a child in the landlord's family, the farmers of the estate pay one rupee each, and the *rayats* from two to four ánnás; (20) at the *Harihar*, *Diwáli*, *Kandh ashtami*, *Chait naumi*, *Holi*, *Jivatiá*, and *Karmá* festivals, miscellaneous contributions, either in money or of *ghí*, curds, milk, and goats for sacrifice, are levied from both farmers and *rayats*.

The Domestic Animals of the District consist of cows, bullocks, buffaloes, a few horses, goats, sheep, pigs, cats, dogs, fowls,

ducks, and pigeons. Oxen, cows, and buffaloes are the only animals used in agriculture. Those reared for food, or for purposes of trade, are cows and oxen, buffaloes, goats, sheep, and pigs, and ducks and fowls. The price of an ordinary cow is Rs.7-8-0 (15s.); of a pair of oxen, Rs.15 (£1, 10s.); of a pair of buffaloes, Rs.25 (£2, 10s.); a score of sheep, Rs.25 (£2, 10s.); a score of kids six months old, Rs.10 (£1); and a score of full-grown pigs, Rs.40 (£4).

THE AGRICULTURAL IMPLEMENTS in common use are the following:—(1) *Hál*, or plough. (2) *Joáth*, or yoke. (3) *Kodár*, or hoe, used for constructing the low earthen embankments which mark the boundary of each field; also for digging trenches for purposes of irrigation, and for loosening and turning up the soil in case the field should become overgrown with weeds. (4) *Hengá* or *chauki*, harrow. This is an implement made of two long pieces of wood, with cross-sticks of the same in the shape of a ladder. It is dragged over the field after ploughing in order to break the clods, as well as to level the ground before sowing. The *hengá* is drawn by oxen, the driver standing upon it in order to give it weight. (5) *Khurpi*, a weeding hook. (6) *Hansuá*, a sickle for reaping. (7) *Kulhári*, a hatchet to cut timber and clear the jungle. (8) *Basulá*, an adze used as the foregoing. (9) *Chánr*, or irrigating basket; a three-cornered wicker basket, with four strings, for the purpose of baling water from tanks or irrigation reservoirs (*áhrás*). (10) *Láth-khámbá*, a long lever with one end heavily weighted, used for drawing water from a well. The cattle and implements necessary for cultivating what is technically known as "a plough" of land (little more than two acres), with their cost, are the following:—1 pair of cows, or oxen, or buffaloes, value from Rs.14 to Rs.32; 1 plough, share and yoke, R.1; 1 reaping-hook, 6 pie; 1 hoe, 8 as.; 1 hatchet, 4 as.; 1 adze, 12 as.; 1 weeding-iron, 1 anna; and ropes, baskets, fans, &c., 2½ as. The total cost of these implements and cattle represents a capital of from Rs.17-4-0 to Rs.35-4-0 (£1, 14s. 6d. to £3, 10s. 6d).

WAGES AND PRICES have risen considerably since 1855, the earliest year for which any record of prices exists. In 1855 the wages of an agricultural day-labourer were a little more than one ánná per diem; they have now risen to rather over an ánná and a half. A male cooly who, twenty years ago, got an ánná and a quarter for a day's work, will now receive an ánná and a half or two ánnás; and the wages of female coolies, who are largely employed on all sorts of

earth-work, have risen from three-quarters of an ánná to an ánná. Smiths were paid two ánnás a day in 1855, and now get three. Bricklayers' wages have risen from an ánná and a quarter to two ánnás and a half or three ánnás per diem; and carpenters, who formerly were paid two ánnás a day, now get three or even four ánnás.

PRICES OF FOOD GRAINS, and all kinds of agricultural produce have risen proportionately. The annexed table, furnished by the Deputy-Commissioner, shows the prices per *maund* of rice, barley, wheat, and Indian-corn, in the years 1855, 1860, 1866, and 1870.

PRICE OF PADDY, RICE, BARLEY, INDIAN-CORN, AND WHEAT IN HAZÁRIBÁGH DISTRICT FOR THE YEARS 1855, 1860, 1866, AND 1870.

YEAR.	Best paddy per maund.	Best rice per maund.	Common paddy per maund.	Common rice per maund.	Unhusked barley per maund.	Shelled barley per maund.	Indian-corn per maund.	Wheat per maund.
	Rs. as. p.	Rs. as. p.	Rs. as. p.	Rs. as. p.	Rs. as. p.	Rs. as. p.	Rs. as. p.	Rs. as. p.
1855	1 1 0	1 12 0	0 11 0	1 0 0	0 11 0	1 0 0	0 8 0	2 8 0
1860	1 2 0	2 0 0	0 14 0	1 4 0	0 15 0	1 7 0	0 10 0	3 0 0
1866	3 8 0	7 0 0	2 8 0	5 0 0	2 8 0	3 12 0	3 4 0	5 0 0
1870	1 6 0	2 4 0	1 0 0	1 10 0	1 0 0	1 8 0	0 12 0	4 0 0

It will be observed that while the prices of the year 1870 are uniformly higher than those of 1860, the rise of prices in the ten years (1860–70) was not proportionately greater than in the five years 1855–60. That is to say, the rate of increase continued uniform in spite of the famine of 1866; and it is not the case, as has been alleged, that the one year of famine exceptionally affected the prices of subsequent years. The prices of 1866 were of course enormously high, but in the following years prices returned not indeed to their former level, but to their former steady rate of increase. Wheat appears to be an exception; but the increase of R.1 per *maund* from 1860-70, which the table indicates, is spread over an interval of ten years, and the rise of 8 ánnás per *maund* from 1855 to 1860 is the result of only five years. It may not be out of place here to suggest that, during the decade 1860–70, the prices of food grains may well have been prevented from rising more rapidly, by the traffic between the North-West Provinces and Calcutta leaving the Grand Trunk Road for the newly-constructed East Indian Railway. The railway was opened as far as Benáres in 1863. But native traffic was slow to leave the old line of communication, and the demand for food

supplies along the road was only gradually relaxed. Still, no one passing along the road can fail to observe frequent traces of an extinct trade, which must have exercised a powerful influence over the prices of the District.

In the rural parts of Hazáribágh, the rise and fall of prices is indicated by the variations of the size of the *pailá* or measure holding a *ser* weight of grain. Rice is sold at the uniform rate of one pice per *pailá*, but as the price rises the size of the *pailá* diminishes. This custom has some curious results. Disputes are continually occurring as to the size of the *pailá*; and it is a common trick, while measuring out a *maund* of grain, to change the *pailá* for one of a smaller size that had previously been hidden in the sack. Thus also, instead of asking the current price of grain, a man will walk round the market and narrowly watch the size of *pailá* which different dealers are using. While the prices of food grains maintained their steady rate of increase, in spite of the disturbance caused by the famine year, the price of distilled and fermented spirit, which had previously been quite stationary, rose suddenly in 1866, and has maintained the same level ever since. Thus liquor distilled from the *mahuá* flower was sold both in 1855 and 1860 at Rs.10, Rs.5, and Rs.1-4-0 per *maund*, according to its quality. In 1866, the three sorts rose respectively to Rs.20, Rs.10, and Rs.2-8-0, exactly double their former prices, and these enhanced prices were still current in 1870. *Tárí* or toddy, the fermented liquor made from the juice of the date-palm, stood at Rs.1-4-0 per *maund* in 1855-60; in 1866, it rose to Rs.2-8-0 per *maund*, and was still sold at that price in 1870. *Hándiá*, or rice-beer, the price of which was R.1 per *maund* from 1855 to 1860, rose in 1866 to Rs.2-8-0 per *maund*; and this price, more than double the former rate, was still being paid in 1870. I am unable to find out why the prices of intoxicating drinks were thus permanently enhanced by the famine of 1866.

Probably both wages and prices in Hazáribágh will continue to rise. The extension of roads and railways cannot fail to enhance still further the price of agricultural produce; and the demand for labour in coal-mines, tea plantations, and on all kinds of Government works, is already beginning to affect the general rates of wages. Until, however, the *kamiá* system of bond-labour is put an end to, the position of the lower grades of cultivators will not be materially ameliorated.

Weights and Measures.—The weights and measures made use of in Hazáribágh District are the following:—The standard for buying and

selling in the *bázár* is based upon two sorts of weights—one a *ser* of 48 *tolás*, and the other of 80 *tolás*, each *tolá* weighing 180 grains; the former one being the *kachchá*, and the latter the Government standard *ser*. The weights and their equivalents in English are as follow:—5 *sikká tolás* of 180 grains each = 1 *kánuá* or *chhaták* = 2 oz.; 4 *kánuá* = 1 *páo*, or about 8 oz.; 4 *páo* = 1 *ser* of 80 *sikká* or *tolá* weight = 2·205 lbs.; 5 *ser* = 1 *panseri*; 8 *panseri* = 1 *man* or *maund* of 82 lbs. These weights are all based upon the Government standard *ser* of 80 *tolás*; but at Rámgarh a *ser* weighs 72 *tolás*, and in *parganá* Karanpurá as much as 90 *tolás*. The other denominations of weight are the same in name as those given above, their weight varying according to that of the *ser*. Grain is measured generally according to the following standard:—16 *kánuá* of 2 oz. avoirdupois each = 1 *pailá*, or 2·205 lbs.; 40 *pailá* = 1 *káth* or 1 *maund* = 82 lbs. The measure of the *pailá* varies in different *parganás* with the weight of the *ser*; but the proportion of weights and measures are the same. Thus a *pailá*, which forms the basis of the measure, is a wooden bowl that weighs from $\frac{3}{4}$ to $1\frac{1}{2}$ *ser*, standard weight. Gold and silver weight:—$6\frac{1}{4}$ *rati* of $1\frac{4}{5}$ grains troy each = 1 *aná*, or $11\frac{1}{4}$ grains; 8 *rati* = 1 *máshá*, or $14\frac{2}{5}$ grains; 100 *rati* or 16 *aná* = 1 *tolá* or *sikká* of 180 grains troy; $106\frac{1}{4}$ *rati* or 17 *aná* = 1 *mohar*, or $191\frac{1}{2}$ grains. Gold and silver weight is used for apothecaries weight. Liquid measure:—5 *sikká* = 1 *chhaták*, or $\frac{1}{8}$ of a pint; 4 *chhaták* = 1 *páo*, or $\frac{3}{4}$ of a pint; 4 *páo* = 1 *ser*, or $1\frac{1}{3}$ quarts; 40 *sers* = 1 *maund*, or 30 gallons. Land is measured according to the following standard:—20 *phurki* of about 29 inches each = 1 *dhurki*, or 4 feet 7 inches; 20 *dhurki* = 1 *dhur*, or 81 square feet; 20 *dhur* = 1 *káthá*, or 1620 square feet; 20 *káthá* = 1 *bighá*, or 32,400 square feet. Measures of distance are computed thus:—About 440 *deg* or paces = 1 *guli* or gun-shot distance; 4 *guli* = 1 *kos*, or about 5280 yards = 1 English league. The current measures of time are as follow:—60 *pal* of 24 seconds each = 1 *dand*, or 24 minutes; $7\frac{1}{2}$ *dand* = 1 *pahar*, or 3 hours; 8 *pahar* = 1 *din*, or day and night of 24 hours; 30 *din* or days = 1 *máhiná* or month; 12 *máhiná* = 1 *baras* or year.

COMMON DAY-LABOURERS who neither possess nor rent land, are called *majurs*. They are usually paid in grain, and get about two *sers* of rice, or five *sers* of *maruá*, for a day's work.

KAMIÁS OR SERFS.—There is one other class of labourers whose position is so peculiar as to require detailed notice. These are the *kamiás*; men of the cultivating class who bind themselves to

manual service in consideration of a lump sum of money, or until they discharge an existing personal debt. The *kamiá* is fed and clothed by his master, and his children are married for him, the amount thus advanced being added to the sum of the debt. Nominally, he may regain his freedom by paying the amount due; but so far is this from being the case in practice, that the obligation of service is held to extend even to his children, who work on as *kamiás* after their father's death. The *kamiá* system seems to have arisen naturally from the peculiar economic conditions of the District. Hazáribágh is even now in that early stage of development, when the general proposition that land is limited in quantity has not had time to make itself felt. Land is still a drug; and the other requisites of production, labour and capital, are proportionately far more important. In the paragraph on the Classes of Land (p. 97), I have already laid stress on the initial labour that is needed to create a rice-field in Hazáribágh, even before the process of cultivation is commenced. At the beginning of this century the District was more backward than it is now; and the immigrant Hindu speculators from Behar succeeded, like the Eupatrids of early Athenian history, and the Patricians of early Roman history, in making bondslaves of the lower classes by sheer power of money. This is an obvious means of securing cheap labour in a thinly populated country, and it can hardly be doubted that the system was introduced by the moneyed Hindu settlers. It is certainly unknown among the aboriginal races. The District Records of forty years ago show that the status of a *kamiá* was at that date more rigidly defined than it is at the present day. The *kamiás*, then as now mostly of the Bhuiyá caste, executed a formal bond (*saunknáma*), the terms of which were of three degrees of stringency. Under the first and most severe, the *kamiá* bound himself and his descendants to serve in perpetuity. His children were born slaves of the estate, and were married at the proprietor's expense. The second class contracted to serve for the term of their own lives; and the third, who were called *sánwaks*, only until the sum borrowed should be repaid. The two former classes were treated as part of the estate of their owner, and were transferred by sale or mortgage like other property. Maltreatment of a *kamiá* by his master did not discharge the obligation; but such cases are said to have been rare. In the event of a *kamiá* absconding, his owner was entitled to sue on the bond for possession of his person. Such proceedings

were not uncommon, and it was thus that the British Courts were enabled to modify the original system. A claim for possession of a *kamiá* was only admitted, if he had himself executed the *saunk-náma* on which action was brought, and had done so when of full age. All claims to minors or females were summarily disallowed; and maltreatment was held to void the obligation. Latterly, however, the practice of suing on a *saunk-náma* for possession of the person of a *kamiá* has entirely disappeared. Bonds are still drawn up, but the condition that the obligee will work out his debt is frequently omitted altogether, and the document is only used to coerce the *kamiá* with the threat of a legal process. Professor H. H. Wilson in his *Glossary of Indian Terms*, ed. 1855, gives the following account of the *kamiá*:—"*Sánwak*, Hindí; corruptly, *Sawuk*, *Saunk*, *Saunkiá*, *Sunkiá*, and *Sankiá*. A slave, in Chutiá Nágpur: there are three classes; the *Sánwak*, who is hereditary; the *Bandha Sánwak*, a slave for life, but whose children are not slaves; and the *Chotá Sánwak*, a slave for debt under a written bond. In the Districts bordering on Chutiá Nágpur, or Rámgarh, Hazáribágh, &c., the *Sánwak* is described as one who becomes a slave for life on receiving a certain sum of money, and who cannot redeem himself by repayment of the original advance: according to other authorities he may redeem himself, but is seldom able to do so. The *Sánwaks* are generally from the low or outcast hill tribes." The substance of the following paragraphs is derived from the answers to a series of questions, circulated for me by the District Superintendent among the Sub-Inspectors of Police.

Kamiás are employed in every description of agricultural labour, from levelling a terraced rice-field out of the hill-side to reaping and storing away the ripe crop. They are invariably paid in kind, being given their food day by day at the ordinary meal times. The quantity of food given varies in different localities; but the general practice appears to be that besides a *lukmá* or double handful of parched rice or *láwá* in the morning, a male *kamiá* receives during the day about one *ser* and a half of cooked food, or four *sers* of paddy or any grain that requires preparation. Women are paid in the same manner, but get a smaller amount of food. During the three months of Paush, Mágh and Phálgun (15th December—15th March), *kamiás* receive no pay at all, as the work of cultivation is suspended. At the end of the season, however, when the crop is gathered in, a lump payment of grain is given them, the amount of which is settled by

the custom of the locality. Thus, if this payment is made at reaping time, the *kamiá* is entitled to take one sheaf in every ten sheaves, or one *maund* in every ten *maunds* of the paddy which he reaps. This is the most liberal scale in vogue; and in some parts of the District his share is as low as one sheaf in fifteen, or one in seventeen. Sometimes the *kamiá* is allowed to take the paddy of one square *háth* out of every twelve *háths* which he reaps; and the women supplement this by gleaning. If the payment is made when the crop is stored, the *kamiá's* tithe is usually one-twelfth of the produce.

The most complete and minute account of the present status of the *kamiás* which came before me divides them into three classes. (1) The *saunkiá chotá*, corresponding to Wilson's *chotá sánwak*, who has borrowed a sum of about Rs. 20 (£2), and executed a bond engaging to serve as a *kamiá* until the principal has been paid off. (2) The son of a *kamiá*, the expenses of whose marriage have been paid by his father's master, and who in consideration of that payment agrees to take up his father's obligation on his death, or when he becomes too old to work. A son is under no obligation to serve for his father's debt, unless he has himself been married at the master's expense; and even in that case, he does not become a slave for life. If the master declines to pay the cost of his marriage, he is at liberty, if he chooses, to enter into a *kamiatí* contract with a third party. In any case, he would be free when he paid off the debt. This class, as far as I can discover, has no special home, and does not correspond with any of Wilson's divisions. (3) A *kamiá* who has taken a loan, and executed a bond to serve for life, whether the debt be paid or not. This class also has no special name, but obviously corresponds with Wilson's *bandha sánwak*. The obligee's children, however, do not become slaves; and even if their father dies without repaying the loan, the obligor has no claim against them. This is the most stringent form of debtor's servitude which now exists in Hazáribágh; and the original usage by which a man pawned himself and his descendants has entirely gone out, owing probably to the action of the British Courts, which is described above. It is curious that the amount of loan which creates a *kamiatí* obligation is fixed by custom, and varies according to the caste of the obligee. Thus from Rs. 12 to Rs. 20 (£1, 4s. to £2) will be paid to a Bhuiyá, Rs. 25 (£2, 10s.) to a Káhár, and Rs. 30 (£3) to a Goálá or a Turí. The bulk of the *kamiás*, however, are of the Bhuiyá caste. A woman who marries

a *kamiá* does not *ipso facto* forfeit her own freedom. She is called *kamiáni*, but this is merely a title; she is not expected to work for her husband's master, and if she does so is entitled to be paid. As a rule, she does ordinary household work for the master and is paid in kind. There is, however, one exception to this rule. If the *kamiá's* master paid to the woman's father the customary marriage present on behalf of the *kamiá*, the wife is held to be *kharídá* or purchased, and takes the same status as her husband. I gather from all the reports which I have seen, that the employers of *kamiás* are perfectly aware how essential the bondmen are to their cultivation, and that the relations between the parties are friendly. Notwithstanding this, it is continually becoming more common for *kamiás* to run away; and there can be no doubt that greater facilities for emigration, and the enhanced demand for labour on public works, railways, roads, and mines, together with the general though slow advance of education, will gradually break up the entire system of *kamiá* labour.

To illustrate the foregoing remarks I annex a translation of a *kamiá* bond of recent date.

"The bond of Bhínak Bhuiyá, son of Chamár Bhuiyá, residing in village Paláon *parganá* Champá, Hazáribágh District. Whereas in time past I borrowed from Sítal Rám, *mahájan* (trader) and *iláká-dár* (landlord) of village Chai *parganá* Champá, the sum of Rs. 20 (£2), bearing interest, on the security of my personal labour as a *kamiá* (bondsman) according to the usage and custom of the neighbourhood; I now execute this deed and agree that, until the sum of Rs. 20 be repaid in full, I will in lieu of the interest thereon, continue to work as a *kamiá* for the *mahájan* aforesaid. I will raise no objection to so working, and will receive my *lukmá* and *bhunjá* (a double handful of cooked food distributed to *kamiás* in the morning), and wages according to custom from the said *mahájan*. If I am ill for five days or ten days, my son will labour in my stead. When I grow old and can work no longer, and if I dispute the debt, the *mahájan* aforesaid is free to sue me in court for the amount of the loan. But if my son shall then take upon himself my debt and obligation to work, the said *mahájan* shall have no further claim against me. If at any time I repay the principal, I shall be free to go where I please. Wherefore I have executed this *kamiati* bond to be evidence of the agreement, if need be."

SPARE LAND.—The amount of spare land in Hazáribágh District

is variously estimated at 2,790,425 and at 2,940,457 acres. Both estimates are admitted to be merely approximate; but no one in passing through the District can fail to be struck with the quantity of cultivable land that still remains untilled. In spite of this, there is everywhere, and especially in Kharakdihá, the liveliest competition for any cultivated land that becomes untenanted. It is, I am informed, the practice on the Dhanwár estate that, when a *rayat* runs away or dies, leaving his rent unpaid, applicants readily come forward with petitions to be allowed to take the land on condition of paying up the arrears of the last tenant. An amount equivalent to a payment of from Rs. 5 to Rs. 10 per *bighá* is not unfrequently paid in this way. This sum would be fully adequate to the cost of clearing an equal amount of fresh land. But not only are *rayats* very slow to avail themselves of the spare land, but the very classes who are best fitted to open up fresh cultivation, are those who emigrate most readily to the Tea Districts of Assam and Cachar. The following appear to be among the causes of this apparent inconsistency:—In the first place, the *rayat* who thus takes up the land and liabilities of an absconding holder, invests his entire savings in what will yield him a sure return at the end of the next rice season. If he were to apply that capital to the preparation of fresh land, he would not get a really profitable crop before the third year. Nor would he have any security in the case of a native landlord, that his new holding would not be assessed at full rates directly it had been found to yield a full crop. Again, the conformation of the country is such, that the formation of new rice land, if it is to be a success at all, must be carried out on a large scale. The broken hollows or troughs (*garhás*) in which the country runs must be worked into terraces in a single season. A *rayat*, who attempted to terrace off only a portion of the slope, would have his newly constructed rice field washed away by the next rains. Moreover, he would probably find himself working on an isolated plot of land, and would be indisposed to give his crop the amount of attention, and especially of night watching, that is essential to success. The same causes, in the main, operate to an equal extent to deter a *mahájan* from investing capital in opening up fresh land. The ordinary *mahájaní* system offers safe profits; and the more enterprising members of the class, who are landowners as well as moneylenders, find their account in accumulating lands which have already been brought under cultivation.

What has been said above must be understood to refer only

such spare land as lies on the margin of ordinary village cultivation, and might afford a livelihood to the common class of peasant. Of spare land for the growth of special commodities, like tea and coffee, there is no lack. The waste lands of the Rámgarh estate are let to approved applicants on the following terms :—A lease for twenty years, during the first seven of which no rent is charged on land that was uncleared when the lease was granted, while the ordinary *parganá* rate is taken from all cleared land. At the end of seven years, all land that has been cleared in the meantime is assessed at the *parganá* rate. On the expiry of the lease, it is renewable on the same terms, provided that no dues under the first lease remain unpaid.

LAND TENURES.—The following paragraphs are condensed almost *verbatim* from a special report by Colonel H. M. Boddam, Deputy-Commissioner :—

Hazáribágh may be described as consisting of five main territorial divisions, viz., Rámgarh, Kundá, Kodarmá, Kharakdihá, and Kendí. For a correct understanding of the land tenures of the District, it appears to be essential to treat of these separately.

LAND TENURES IN RÁMGARH.—*History.*—The founders of the Rámgarh family, as has been stated in a previous page (p. 18), were Sinhdeo and Bágdeo Sinh, two adventurers from Khairágarh in Bundelkhand, who took service under the Maháráját of Chutiá Nágpur. Bágdeo, the younger and more astute of the two brothers, observing that the portion of the Chutiá Nágpur territory now called Rámgarh was composed of petty estates owned by chiefs who, although vassals of the Maháráját, were at continual enmity with each other, determined to carve out a kingdom for himself. Assisted by Sinhdeo, he quarrelled with the Chutiá Nágpur Rájá, and led a body of adventurers into *parganá* Karnpurá, then governed by one Kappir Deo. Having defeated him, he made himself master of that *parganá*, and gradually extended his conquest over twenty-one other *parganás*, composing the bulk of the present Rámgarh estate. He made his elder brother *faujdár*, or chief of the local levies, with the title of *thákur*. In 1871, Mukund Sinh, a lineal descendant of Bágdeo, was Rájá of Rámgarh; while Tej Sinh, a representative of the elder brother Sinhdeo, was *faujdár*. Mukund Sinh added to his Ráj *parganá* Chai, driving out Rájá Lál Khán, and giving him a precarious *nánkár* allowance of *sikká* Rs. 1200 a year. The Fiscal Division of Chai was then composed of five petty chiefships—Rampur, Jagodih, Puroria, Itkhurí,

and Pitiz. A former Rájá, whose name is now unknown, had before this added *parganá* Kháspur of Mánbhúm to the Rámgarh Ráj; but when the English Settlement was made, this *parganá* reverted to the Rájá of Pánchet. Tej Sinh, the *faujdár*, quarrelled with Mukund Sinh, made terms with the English through Lál Bahádur Sinh, a resident of Gayá, and offered his assistance to conquer the country. His offer was accepted; and a force being led into Rámgarh, Mukund Sinh was defeated and fled for his life. It is said that he died shortly after his deposition, leaving an infant son, who, however, did not live long. Tej Sinh was placed by the English in possession of Rámgarh, but only styled *mustájir*, or farmer. Thus, in the revolution of time, the elder branch succeeded to the kingdom, which, during so many generations, had been governed by the younger branch. Tej Sinh did not live long to enjoy the fruits of his revolt against Mukund Sinh, but was succeeded by his son, Párasnáth Sinh, in 1772. From him the estate passed in 1784 to Maninath Sinh, with whom the Permanent Settlement was concluded in 1790.

Maninath Sinh was the first of the Rájás of Rámgarh who refused to acknowledge the supremacy of the Mahárájá of Chutiá Nágpur, and to receive the *tilak*, or symbol of investiture, from the chieftain's big toe. In 1862, Rámnáth Sinh succeeded to the Rámgarh estate, and died four years after, in 1866. In 1867 a posthumous child was born to his widow, but it died in the following year. The estate was then claimed by the widow of Mahárájá Rámnáth Sinh, by Thákur Jibnáth Sinh, and by Bábu Barm Náráyan Sinh, the fourth in descent from Tej Sinh by a second wife. Barm Náráyan Sinh and Mahárání Hiránáth Kunwarí died while the suit was pending. By a decision of the Privy Council, the son of Barm Náráyan Sinh (Bábu Nam Náráyan Sinh) has been declared the rightful owner of the estate, and is now in possession.

In recognition of the services rendered by Lál Bahádur Sinh, who died very shortly after the conquest of Rámgarh, the English Government gave, in 1780, to his son, Lál Wazír Sinh, a perpetual rent-free grant of twenty-four villages, valued at Rs. 5022 per annum. Of these twenty-four villages, two are situated in Gayá District, and are valued at Rs. 1000 per annum; the remaining twenty-two carry a rental of Rs. 4022, and are scattered throughout the Rámgarh estate. The whole of these villages have, however, been sold piecemeal, and have passed out of the hands of the heirs of Wazír Sinh.

The revenue of the Rámgarh estate was fixed at the time of the Permanent Settlement at *sikká* Rs. 28,100-15-3, payable from A.D. 1790. In the following year the Rájá was allowed the following deductions on account of *sáyer*:—*Abkárí*, or excise, Rs. 800-5-6; *Háts*, or markets, Rs. 377-11-6; total, Rs. 1178-1-0. By some mistake in calculation, instead of the revenue being fixed at *sikka* Rs. 26,922-14-1, the Rájá was directed to pay only *sikká* Rs 26,914-14-1. In the following year, A.D. 1792, the Rájá was allowed a further deduction of Rs. 347-11-4 in his revenue, being the rent of certain lands taken up for the formation of cantonments.

At its creation in A.D. 1790 Rámgarh formed a single compact estate. It has, however, been since split up into four separate estates, Rámgarh, Kodarmá, Kenduá, and Government lands in and around Hazáribágh, called *sarkárí hattá*. The circumstances under which *parganá* Kodarmá became separated from Rámgarh are related below (p. 128). At the time of separation the *parganá* was assessed at *sikká* Rs. 295-5-9; and an equivalent reduction being made in the Rámgarh revenue, the latter stood in 1808 at *sikká* Rs. 26,271-13. The plot of ground taken up for the cantonment site in A.D. 1792 was gradually added to as circumstances required, Government paying rent for the land. These additions were made in A.D. 1819, 1839, 1854, and finally in 1865; the land thus taken up forming a *mukarrarí* tenure held at a rent of Rs. 3957-1-7. This sum used to be paid to the Rájá in cash annually up to the year 1871, when he was allowed a reduction of his revenue to that extent; and this tenure has thereby become a Government *khás mahal*, though held upon a *mukarrarí* lease. This estate, known as *sarkárí hattá*, consists of fourteen entire villages and portions of seven villages in and around the town of Hazáribágh. A second Govenrment estate, Kenduá, *parganá* Chai, is situated in Rámgarh. This village was resumed as *taufir*, or omitted from settlement, at the time when resumption proceedings were being carried out in 1847–48. It is now settled in farm for twenty years, viz., from 1861 to 1881, the Settlement being made at the same time and in the same manner that *parganá* Kodarmá and other Government villages in *parganá* Kharakdihá were settled.

The present revenue of the Rámgarh estate stands thus:—*Sikká* Rs. 26,271-13-0 = current Rs. 28,023-4-1; deduct Rs. 3957-1-7 balance, Rs. 24,066-2-6, or £2406, 12s. 4d.

Police.—The Rájás of Rámgarh maintained the following Police Stations, at a cost of Rs. 2592-12-0 per annum:—Hazáribágh, Jehak, Gumiá, Rámgarh, Paghár, Huntergánj, and Itkhurí. On the introduction of the new police in 1862, Government ceased to demand the payment of police by the Rájá, who has, however, still to keep up a special force of police entitled *digwárs*. These *digwárs* or road-watchmen have been maintained from ancient times, to watch the roads and passes scattered over the estate. Their numbers vary according to circumstances, the District Officer having the power to call upon the *zamíndár*, to appoint as many *digwárs* as he may consider necessary to watch any particular road or pass, where robberies and *dákáitís* have been frequent; or, when occasion requires, to reduce their number. The *digwárs* used formerly to be paid by assignments of land; and there are at present 89 grants, consisting of 88¾ villages, held by *digwárs* on the condition of guarding certain stated passes, &c. The late Mahárájá Rámnáth Sinh, however, stopped the practice; and when directed to employ *digwárs*, paid them monthly salaries.

Tenures held directly from the estate are the following:—

(1) *Shámilát or Shikmí Táluks*.—I have mentioned above that *parganá* Chai was composed of five petty chiefships. These Rájás were semi-independent, only paying tribute to Rájá Lál Khán; and when merged into Rámgarh, continuing to pay tribute to the Rámgarh Rájá. When the country was taken by the English, and its Settlement was being made, these Rájás endeavoured to get Settlements made with them direct; but their efforts failed, and though they were maintained each in his Ráj, they were directed to pay their tribute, which was then converted into a fixed rental, to the Rájá of Rámgarh. The Rájás of Rámpur, Jagodih, Paroniá, and Khori accepted these terms, and have been made *shikmí tálukdárs*. The Rájá of Pitiz, who was a resident of Gayá, refused to agree, and made over his *táluk* to the Rájá of Kendi, into whose estate this *táluk* has merged, and the title has been lost. Similarly, the Rájá of Barsot succeeded in saving his estate from being merged into that of Rámgarh, and the estate was made a *shámilát táluk*, as also was *parganá* Kodarmá; but the circumstances relating to this last, its severance from the Rámgarh estate, &c., are related in a subsequent section (p. 128). There is a legend that there were two more such *shikmí táluks*, viz., Tilyá and Golá; but they have long been extinct, and have merged into the Rámgarh estate.

The law of primogeniture obtains in these five *shámilát táluks*, as in the twelve large maintenance grants above mentioned, sanctioned by ancient custom only.* In all other tenures the regular Hindu law is followed.

(2) *Khairát or Maintenance Tenures.*—Land was plentiful, while actual cash was the reverse. Every Rájá had to maintain the younger branches of the family; and, therefore, each succeeding Rájá did so by giving either a tract of land or a number of villages, as maintenance grants. There are now twelve of these maintenance tenures in existence—one such tenure, last held by Nam Náráyan Sinh, having been absorbed into the parent estate, owing to the maintenance holder having succeeded to the estate of Rámgarh. These maintenance *jágírs* are as follows:—(1) Markacho, (2) Bagro, (3) Khairá, (4) Dandh, (5) Háwái, (6) Solári, (7) Jariá, (8) Dháb, (9) Chepá, (10) Barratur, (11) Peto, and (12) Kabká. In addition to these, there are a large number of other maintenance holdings, created some before and some subsequent to the Permanent Settlement, and given by preceding Rájás to relatives by marriage.

(3) *Jágír or Service Tenures.*—To enable the Rájás to maintain their possessions, they gave grants of lands to their retainers, on condition of their keeping up a certain force, but paying no rent. The grantees held only during the will of the Rájá, and were dispossessed by a word. Matters continued on this footing, both Tej Sinh and Párasnáth Sinh exercising their powers of re-entry on these grants-at-will, until in A.D. 1790 an inquiry was instituted with the view of carrying out the Permanent Settlement. In the course of this inquiry, it appeared that a considerable portion of the estate was held rent free by the Rájá's retainers and other establishments, under the appellation of *khairát* if held by Bráhmans, and *jágír* if held by other castes. Twenty years of British rule had brought matters to such a state of stability, that the retention by the Rájá of a military establishment was no longer considered necessary; and it was also deemed convenient to put an end to this system of tenancies-at-will. Accordingly, Mr Brown, in 1792, with the sanction of the Board of Revenue and the mutual agreement of the Rájá and these tenure-holders, made the following arrangements:—The holders were to keep up the establishments no longer, to perform no further service, and to hold their grants for life; but they were to pay rent to the Rájá in the following proportions: *jágírdár's*

to pay six ánnás in every rupee of the ascertained assets of the lands held by them, and *khairátdárs* to pay four ánnás in the rupee of the ascertained assets of their grants. When this arrangement was completed, the revenue to be paid by the Rámgarh estate, which previously amounted to Rs. 40,000 per annum, was reduced to Rs. 28,100-15-3, fixed for ten years, and subsequently made perpetual. Although the Rájás of Rámgarh, by the above-mentioned arrangement, had the power to resume these *jágírs* and *khairáts* on the death of the holders, they never exercised this power. But on the death of the holder, sometimes on the receipt of a *nazráná*, but more frequently without any consideration, they confirmed the original grant to the heirs and successors until, by efflux of time, they lost the power of redemption; and the life tenures have now become permanent, and liable to resumption only on the failure of heirs of the original grantees. In confirming these *jágír* grants, the Rájás only recognised the eldest son or the eldest branch of the original holder. After the Permanent Settlement, the Rájás of Rámgarh created by *sanads* fresh *jágír* and *khairát* grants, either as rewards for good service or for some good consideration, assimilating the nature of the new grants to those of the old *jágír* and *khairát* grants, the difference being that the old *jágírs* and *khairáts* granted before the Permanent Settlement are held on unwritten, while those subsequently created are held by written contracts. The Rájás also created a number of service grants, designating those that were created on the condition of the performance of religious ceremonies as *khairát baiswán*; while those that were given on condition of performing other services were styled *jágír baiswán*, the word *baiswán* signifying "placed from," "to sit." Very many of these grants were resumed while these estates were under the Court of Wards, as the conditions under which these tenures were held were no longer performed or required; but still a few exist, and are comprehended in the class of *jágír* and *khairát*. Among the *jágírdárs* and *khairátdárs* the general Hindu law of equal division prevails, with this exception, that in some families the eldest representative of the family obtains a share one-tenth larger than the rest of the family; this custom is called *dasans* (the tenth part), or *yethans* (share of eldest).

(4) *Deori.*—Every holder of the Rámgarh estate makes a grant to his wife for her private expenses, under the name of *deori*. The grant is only for the lifetime of the grantee, unalienable, and on her

death reverts to the parent estate. There are at present three such grants extant, held by widows of Rájás Sidhnáth Sinh, Lachmínáth Sinh, and Sambhunáth Sinh.

(5) *Thikádárí.*—The farming system has from time out of mind existed in this estate. With the exception of some half-dozen villages, which the Rájás kept for their own cultivation, and in which they had *bhándárs* or granaries, the rest were leased out for a term of five years. Mahárájá Sambhunáth Sinh increased the farming period from five to six years. His successor, Mahárájá Rámnáth Sinh, observing that these farmers had no permanent interest in the well-being of their leaseholds, and that the only object they had was to screw as much as possible out of the *rayats*, without doing anything to improve their villages, determined to create *mukarrarí* tenures, in order to remedy these evils. Accordingly, in 1864, he gave to all that came forward and agreed to pay double the rent formerly assessed on the village, and a *salámí* or *nazráná* equal to this one year's increased rental, leases containing the words *istamrári mukarrarí*, but omitting all mention of heirs and successors. During the short period of his life, he created 644 such *mukarrarí* holdings, a few of which were given in the name of one person, but the generality in the names of two parties; the amount paid as *nazráná* not being mentioned in the *pattás* and *kabuliyats*, which were all duly registered. The present holder of the estate maintains that these grants were only made for the lifetime of the parties mentioned in the written contract; and that the words *mukarrarí istamrári*, without any mention of heirs and successors, limited the grant to the lifetime of the grantees only, and has instituted a suit as a crucial test, which is now (1875) pending in the Civil Court.

(6) *Rent-Free Tenures.*—Singular to say, in 1795, when rent-free tenures of every District were under inquiry and registration in the Collectorate, although all rent-free tenures in Kharakdihá and elsewhere were registered, not a single such tenure in the Rámgarh estate was placed on record in the Collectorate books. There are, however, 982 such rent-free tenures, a few of them extending to a whole village, but by far the greater number consisting only of a few *bighás* of land.

Cultivating tenures in the Rámgarh estate are of the four following classes—*mánjihas*, *sájwát* or *khundwát*, *jíban*, and *utkar*.

(1) *Mánjihas Lands.*—A certain proportion of the best land in every village is set apart, and called *mánjihas*. This land

is the right of the immediate head of the village, and kept for his cultivation. If unable or unwilling to cultivate it himself, the headman (whether farmer, *jágírdár*, *mukarraridár*, or whatever his tenure, temporary or permanent, may be) may lease it to the *rayats*, but the *rayats* can never acquire a right of occupancy in *mánjihas* land; it is intended for the private use of the proprietor or his representative. The cultivation of this land is, moreover, carried out entirely by the labour of the villagers, for which no payment is made, the owner of the *mánjihas* having only to supply the seed and a light meal termed *kuráibhojá*, composed generally of *makái*, *janirá*, &c., on the days the villagers are working on his land. It is, however, but seldom that the *mánjihas* land is leased out, and then only at a rate much higher than is generally prevalent in the village.

(2) *Sájwát* or *khundwát* are lands reclaimed from jungle by the *rayat* or his ancestors. In such lands the *rayat* has not only a right of occupancy, but the right to hold at a privileged rate. By custom, which is enforced by the District Courts, this privileged rate is half of that prevailing in the neighbourhood for lands in which *rayats* have rights of occupancy. About 25 per cent. of the *rayats* on the Rámgárh estate are said to be holders of *khundwát* lands.

(3) *Jiban* is an occupancy tenure of a peculiar nature. The system of shifting cultivation, which is characteristic of early agricultural communities, is even at the present day very common in Hazáribágh. Under this system, the right which an hereditary cultivator claims is not that of occupying continuously a specific plot of land, but of cultivating each year a certain amount of land within the boundaries of the village. The Deputy-Commissioner says:—"The manner in which the *jiban* land is distributed among the *rayats* is somewhat complicated, and rather difficult to explain. The *jiban* land in every village is supposed to be divided into lots. These lots bear different nomenclatures in different *parganás*; in some they are called *dhaki*, *oreyá* (one-half *dhaki*), *koñi* or *pawa* (one-fourth *dhaki*); in others *patti*; in others, *áná*; in others, *kánwá*, *khorí*, or *morí*. Thus in *parganás* Golá and Changará, the division of land is by the *dhaki*; by the *patti* in *parganás* Kalianpur, Karnpurá, Goriá, Jageswar, and part of Ahuri; by the *áná* in *parganás* Champá, Rámpur, Holang, Dattárá, Tisrí, Singpur, Bámanbeh, and part of Barsot; by the *kánwá* in *parganá* Chai; by the *khorí* in *parganá* Palani; by the *morí* in *parganás* Gumo, Markacho, and part of Barsot. There is no fixity in the number of lots

the villages may contain. One village of considerable size may contain only twenty lots; the neighbouring village, not half its size, may also contain twenty; while a third village, smaller than either, may contain twenty-five such divisions. Another element of complication arises from the fact that none of these lots contain any fixed area; on the contrary, the chances are that no two lots in a village, though called by the same designation, are equal to each other. The settlement of a village, therefore, is carried out in the following manner. Say that a village (after deducting the *mánjihas* and *sájwát* lands) consists of 20 *dhaki*, and that it contains thirty *rayats*, of whom ten have rights of occupancy over 12½ *dhakis*. These 12½ *dhakis* will be called *jíban*, and the rest of the village *utkar*, lands. The ten *rayats* having occupancy rights would choose their lands; and then the tenants-at-will would have the rest of the village divided out to them, according to their capability to cultivate the land, and as they come to terms with their landlord. Till very lately, up to the introduction of Act X. of 1859 and Act VI. of 1862 (B.C.), a *rayat* having the right of occupancy did not, as matter of course, always occupy the same land. Perhaps the term "right of occupancy" is incorrect; it should be called "right of cultivation." An hereditary cultivator obtained a right to cultivate a certain portion of land. He seldom cared where the land was situated, whether to the north, east, south, or west of the village; but he insisted upon having the *number* of lots which he had a right to cultivate made over to him. When lands were plentiful, the *rayats* few in number, and when a cultivating *rayat* had no difficulty in finding and keeping his lands, there may have been no difficulties experienced in dividing the villages into these different lots; but the introduction of the above Acts, increase of population, and the great competition for land of late years, have already brought about a change. In a few years more the terms *dhaki*, *kharí*, *morí*, &c., will be unknown; the regular standard Rámgarh *bighá* (of which the pole is 9 feet long) becoming the unit of measurement. I am not sure that the introduction of Act X. of 1859 has given the *rayat* the benefits that it was supposed it would confer. It fails to recognise the right that accrued to him by custom—the right to cultivate a certain proportion of lands, out of which he could not contract himself—and has offered him a right which he cannot claim (not having cultivated the same land always), and out of which the *zamíndár* will take every care to contract himself.

(4) *Útkar* are the holdings of tenants-at-will.

The holders of permanent tenures pay their rents in cash; the exceptions to this are so few that they only serve to prove the rule. Farmers holding under temporary leases may pay their rents partly in cash and partly in kind. While the estate was under the Court of Wards, endeavours were made to do away with this system, but the present holder of the *zamíndári* has re-introduced it.

The *rayats*, as a general rule, pay their rents partly in cash and partly in kind. In some cases in *parganá* Dattárá, the *rayats* pay solely in kind, and there are a few cases in which *rayats* pay all their rents in cash; but these are very exceptional cases. The introduction of Act X. of 1859, and the creation of the *mukarrarí* grants by Mahárájá Rámnáth Sinh, are, however, gradually bringing in the system of cash-payments.

The leases given to *rayats* are usually divided under three different heads—*pattá*, the real rent; *neg*, a money payment in addition to the *pattá*; and *ábwábs*, or cesses. The *ábwáb* again is divided into *nágdí* (cash) and *jinsí* (kind). It should, however, be observed that this kind of *pattá* is only given to *rayats* having the right of cultivation, as *jibandárs*; for *utkar* lands, the tenants-at-will pay always in cash at so much per *bighá*. For *khundwát* or *sájwát* lands, the tenant only pays the *pattá* in cash, without *neg* or *ábwábs*.

Land Tenures in Kundá.—Tenures directly under the estate are *kunwarkárí*, *deodhí*, *khairát*, *jágír*, and *rájjot*.

(1) *Kunwarkárí* villages are enjoyed by the heir-apparent. They were in the possession of the present proprietor of the estate during his father's lifetime. Now that he has succeeded to the estate, this tenure has merged into the parent estate, and will remain so until a grant is made to his heirs.

(2) The *deodhí* villages are enjoyed by the Rání. Until lately they were in the possession of the mother of the present proprietor; but on her death the tenure lapsed to the parent estate, and no new grant has as yet been made by her son.

(3) *Khairát* are ordinary maintenance tenures. The 46 *khairát* villages are comprised in 39 holdings; besides which, there are in the estate 28 other small *khairát* holdings of a few *bighás* of land each, in three villages, named Kundá, Pratápur, and Seorájpur. There are, therefore, altogether 67 rent-free holdings in the estate, without any condition whatever attached to them.

(4) The *jágír* tenures vary considerably in their nature. Some are held in lieu of pay, on condition of guarding the six principal *ghâts* in the estate, besides some of the minor *ghâts* or passes scattered throughout the *parganá*; some are held as service tenures, the holders being bound to perform certain duties, ranging from those of *diwán* to those of the most menial servant; some again are held for simply nominal service; and a few of this class are also merely maintenance grants.

(5) *Rájjot.*—Of the 111 villages which are called *rájjot*, two are in the cultivation of the Rájá, viz., Kundá and Nawádih, and one is in his *khás tahsíl*, viz., Seorájpur. Of the remaining 108, with their *dakhilis*, or attached hamlets, in all 138, the Rájá has settled 10 in *mukarrarí*, constituting them into six perpetual holdings at a rental of Rs. 70. Their annual value, as ascertained in the Road-cess Office, is Rs. 691-10-3. The rent-paying *jágírs* pay him Rs. 560-8 only; while these, together with the other *jágírs* and *khairát* tenures, have been valued at Rs 14,875-5-6. His *khás tahsíl* is valued at Rs. 553-15, and his own cultivation at Rs. 1193.

In the remaining 128 villages the farming system obtains,—a system which is universally prevalent not only on this estate, but throughout the entire District. So far as relates to this estate, villages are let out on leases for six years at a certain rental, leaving the farmers to make what profit they can during the term of their lease. At present there are 106 leaseholders, paying an aggregate of Rs. 5020 to the Rájá, their holdings yielding an aggregate of Rs. 7523-13 to the farmers, giving them a profit of Rs. 2503 13. Thus, the Rájá's profit, or income, from the estate is as follows:—*Khás tahsíl*, Rs. 553-15; Rájá's cultivation, Rs. 1193; rent from *mukarrarí* tenures. Rs. 70; rent-paying *jágírs*, Rs. 560-8; and rent from ordinary leases, 5200; total, Rs. 7397-7; and the annual estimated value of the estate is as follows:—*Mukarrarí* tenures, Rs. 691-10-3; *jágírs* and *khairát* tenures, Rs. 14,875-5-6; and value of ordinary leases, Rs. 7523-13; total, Rs. 23,090-12-9.

The settlement with the cultivators in this *parganá* is of two kinds: first, by *kúts*, after the practice of the adjoining Rámgarh estate, *parganá* Dattárá; and second by *pattis*, after that of Karnpurá; the former practice obtaining in the western, and the latter in the eastern part of the estate. There are 1325 cultivator's holdings in the estate, as shown by the Road-Cess Papers.

Besides these *rayatí* holdings, there is a peculiar custom on this

estate connected with the *jám* cotton cultivation, of which there is a considerable amount. The crop is not grown on the lands forming the holdings of the *rayats*, but in the jungle. The cultivator clears a small space of land by burning the jungle on it; this acts as manure. The space so cleared is called a *dáhá*. Here the cotton is grown for one season; and after the crop is taken in, the land is either left to become a jungle again, or is cultivated with cotton the following year. Priority of entry each year is all that gives a right to a *dáhá*. For each *dáhá* the cotton-grower has to pay four *ánnás* as rent to the *zamíndár* or his representative, without any reference to the quantity of land thus cultivated.

Rent is paid by the *rayats* for their holdings partly in cash and partly in kind, and no step has as yet been taken in this remote corner of the District to introduce any improvement in this matter.

LAND TENURES IN KODARMÁ.—*Parganá* Kodarmá, situated at the extreme north and west of the District, was, as has been explained above (p. 119), included at the time of the Permanent Settlement in the Rámgarh estate, and settled with it as a *shamilát táluk*. Rájá Braja Mohan Sáhi, then holder of the *parganá*, dissatisfied with the arrangement, instituted a civil suit for separation in the District Court of Rámgarh; and obtained a decree in 180- from the Sadr Diwání Adálat, in execution of which the *parganá*, consisting of 52 *assalli* and 12 *dakhili* villages, was assessed separately from Rámgarh at *sikká* Rs. 295-5-9 or Company's Rs. 315-0-10, with a stipulation that the Rájá should maintain the police establishment of Kodarmá, and likewise eight *digwárs* to guard the passes on his estate, and eight *barkandázs* for escort duty between *thánd* Kodarmá and the Sadr Station. Rájá Braja Mohan Sáhi died in 1822, and was succeeded by his son Tip Náráyan Sáhi, who, with his relatives, became concerned in a case of *dákáiti*, for which his estate of *parganá* Kodarmá, together with another estate called Bagridih, in *parganá* Kharakdihá, assessed at an annual rent of Company's Rs. 86-6-5, was confiscated by Government in 1841. On taking possession of the estate, Government created a certain number of life-tenures for the support of the late Rájá's relatives. By the deaths of the original grantees these have undergone certain changes, and now consist of three holdings comprising five villages. At the time of the resumption of the *parganá* it comprised 96 villages, of which 11½ were granted in maintenance, and 84½ were owned by Government. The revenue accruing from the villages held by Government

was at that time Rs. 4292-9-11 per annum, paid in twelve monthly instalments. The following charges were paid out of the Government revenue:—Revenue, Rs. 315-0-10; Kodarmá police establishment, Rs. 1560; repairs of the police building, Rs. 200; *tahsíl muharrirs* appointed to collect revenue, Rs. 180; stationary allowance for *tahsíl muharrirs*, Rs. 18; and pensions to the Rájá and his relatives over and above the maintenance grants, Rs. 480; total, Rs. 2753-0-10. The balance was the property of Government. Subsequently, on the death of Khem Náráyan Sáhi, Digambar Sáhi's wife, Dijbijai Sáhi, and Teláwár Sinh, the 6½ villages granted for their maintenance fell to Government, which reduced the number of maintenance holdings to five, as shown above, and raised the number under Government to 91. The accounts of receipts and disbursements of the *parganá* were kept separate.

Such was the state of affairs in 1860, when the number of villages under Government had increased to 99½, owing to reclamation of land and increased cultivation by the *rayats*. It was now considered expedient to incorporate the management of the *parganá* as a regular Government estate, and settle it as such. Under arrangements carried out by the Superintendent of Revenue Survey, the 99½ villages of the *parganá* were settled in farm in 100 lots for a period of twenty years (1861–62 to 1880–81), the Government demand being fixed at Rs. 6411-0-11 yearly. The original estate of Kodarmá is therefore now composed of 99½ villages, constituting 100 estates. These contain 1148 *rayatí* holdings, all with occupancy rights, acquired by the fact of continuous possession for twelve years.

LAND TENURES IN KHARAKDIHÁ.—Kharakdihá originally formed part of the *zamíndárí* of Sior Muhammadábád, situated in Gayá, the property of Maháráját Mod Náráyan Deo. Nawáb Alí Vardí Khán drove Mod Náráyan Deo out of Kharakdihá (causing him to seek an asylum with the Rájá of Rámgarh), and placed Ikbal Alí Khán in possession.

The portion of his *zamíndárí* of which Mod Náráyan Deo was thus deprived consisted of 38 *ghátwálí* tenures. Each of these tenures was held by a head *ghátwál* called *tikáit*, who, on succeeding to the tenure, received the *tilak* of *tikáit* from the Maháráját, and agreed to pay rent for the holding. These *tikáits* appear to have been semi-independent. All that was required of them was, on succession to the *gádi*, to acknowledge the supremacy of the Maháráját, and annually to pay him a small sum of money as rent. Mod

Náráyan Deo and his son died in exile; and when the English entered Rámgarh, the grandson, by name Girvor Náráyan Deo, represented the family. After the conquest of Rámgarh was secured, attention was turned to that of Kharakdihá. Girvor Náráyan Deo assisted the English heartily, and his influence was of immense importance. Of the 38 *ghátwáls*, 26 were induced to take up Girvor Náráyan Deo's cause, and 10 remained neutral; while only two, Sátgáwán and Khargálí, showed themselves entirely hostile. Ikbal Alí Khán was in his turn driven out of Kharakdihá. It was found that, during his government, he had held direct possession of 17 villages, the assets of which he had expended on his household expenses under the name of *nánkár*. These 17 villages were at once made over to Mahárájá Girvor Náráyan Deo, rent free, in perpetuity, as some acknowledgment of his services, and they now form the nucleus of the present Dhanwár estate. The 26 *gádis* held by the *tikáits*, who took the side of the British Government, were settled with the holders as *mukarraris*, in accordance with the orders of the Governor-General in Council, passed in A.D. 1780. The *ghátwáls* of Sátgáwán and Khargálí, who had resisted the English forces, were dispossessed, and their *gádis* settled in the same year (1780) in *mukarrarí*, with two newly-installed *tikáits*. Twelve farmers, or *ijárádárs*, under Ikbal Alí Khán, who had also rendered assistance to the British, had their holdings converted into *mukarraris* under the Governor-General's orders in 1783. After these 40 *mukarraris* had been settled, an offer was made to Girvor Náráyan Deo to settle with him the remainder of Kharakdihá, consisting of 10 *gádis* and 54 villages, but he refused to accept this arrangement, maintaining that he was entitled to a settlement of the whole of Kharakdihá—a request with which it was impossible to comply, seeing that Government had already entered into direct agreements with so many other persons. The 10 *tikáits* who had remained neutral were permitted to hold their *gádis* as farmers; while the rest of Kharakdihá, consisting of 54 villages, was let in farm on temporary leases to different parties. In the year 1800, the 10 *gádis* hitherto held on temporary leases were given in *mukarrarí* to their respective *tikáits*; and the 54 villages termed *khálsá* were again resettled for a term of 7 years, yielding a revenue of Rs. 5226-12-10 per annum to Government. In 1808, Girvor Náráyan Deo offered to take a permanent settlement of these 54 villages on an annual rent of Rs. 6334; and his application was sanctioned by the Governor-

General in Council in 1809. This completed the Settlement of Kharakdihá by creating 50 *mukarrarí* tenures, one permanently-settled estate paying revenue to Government, and one rent-free (*nánkár*) estate. It will be noted that the *gádis* never came under the purview of the Permanent Settlement. The *tikáits* have been called *ghátwáls*, but there is no mention of this title in their *sanads*, nor in the *kabuliyats* given by them.

Since the Settlement of 1808 various changes have taken place. *Gádi* Bagridih was purchased by the Rájá of Kodarmá; and was in his possession when, in 1841-42, on his being convicted of harbouring *dákáits*, the whole of his estates were escheated to Government. This *gádi* is now the property of Government. It consists of only three villages, and in 1800 was assessed at *sikká* Rs. 81 per annum. It has been leased in farm to the *tikáit* of Gáwan on a rental of Rs. 222-13-9 per annum. The holder of *gádi* Khargálí sold the entire estate to eleven persons. This sale was held to be a contravention of the conditions of the original settlement, and Government took possession of the estate in 1848. The purchasers sued Government for possession; but as they did not bring this suit till more than twelve years had elapsed since the resumption of the estate, their claim was held to be barred by limitation. The original settlement papers of this *gádi* show that in 1780 it consisted of 19 villages only, and was assessed at *sikká* Rs. 315-13-11; when resumed in 1848, it was found to contain 33 villages. In 1860 the *gádi* was settled for twenty years, and was then found to contain 42 villages, which were leased out in 17 lots on an annual rent of Rs. 2404-10-3. Thus we see that, out of the 38 *gádis* in Kharakdihá, two are the property of the Government. In 1847-48 Resumption proceedings under Regulation II. of 1819 were commenced in this District and continued up to the year 1856, when they were summarily stopped, and orders were passed that all the villages of which the proceedings had not finally closed, should at once be made over to the parties in whose possession they had been found. During the above period, however, Government obtained possession of 151 villages, viz., 149 in *parganá* Kharakdihá, 1 in *parganá* Chai, and 1 in *parganá* Kendi. In 1860, all the villages resumed as *taufirs* in Kharakdihá were settled in 52 lots for a term of twenty years, at a rent of Rs. 3765-5-9 per annum. Thus, in 1861, there were 70 revenue-paying estates in *parganá* Kharakdihá, over and above the 51 estates in 1809, yielding an additional revenue of Rs. 6392-13-9.

Shámilát Táluks.—Originally there were only two tenures of this nature, namely Majhládih and Bhandári, which are comprised in *gádi* Dorandá. How these two *táluks* were incorporated with that *gádi* is unknown; but though they are separate *gádis*, they always pay their revenue through the *tikáit* of Dorandá. Before Regulation XIII. of 1833 was passed, transfers of estates and of portions of estates used to be recognised. The sale and transfer, therefore, of a *gádi*, when the whole *gádi* was sold in one lot, made no change in the nature of the tenure. But in those instances in which only a portion of the original holding has been sold and separately assessed, a change had been made, and the tenures thus created I have placed under the head of *shámilát táluks*; for although the purchasers have been entered in the mutation register as proprietors, they are only recognised as part-proprietors, without a definite share, and they have to pay their share of revenue to the *gádidár*. Of these tenures there are 18, making a total of 20 *shámilát táluks*.

Under the *tikáits*, the prevalent tenures are—rent free, *mukarrarí*, maintenance, service *jágírs*, and temporary leases.

There are 618 rent-free holdings in this *parganá*, most of which were registered in 1795. They may be divided into two classes—for religious endowments, and for charitable purposes. There are 66 of the former, 61 of which consist of entire villages; the other 5 consist of grants of land varying from 300 *bighás*, the smallest, to 700 *bighás*, the largest grant. Of the latter there are 552 holdings. These are petty grants of a few *bighás* each, given to Bráhmans in *khairát*. *Mukarrarí* tenures are 58 in number, and are all recent creations under written engagements, by which insolvent *tikáits* have satisfied their most pressing creditors. The Road-Cess papers show 446 service tenures, mostly held by the village *chaukidárs* and *goráits*. A few are held by the principal servants of the *zamíndárs*, and these alone are of any extent. Maintenance tenures are 388 in number. These are grants made to the junior members of the family in Dhanwár, and in the different *gádis* in which the law of primogeniture prevails. Although the junior members of the families in which the above right prevails can claim maintenance, the amount seems absolutely at the discretion of the holder of the estate, who can give as large or as small a grant as he pleases. Grants appear never to be disputed on the score of inadequacy. Of temporary leases there are 1851. The custom of leasing out their villages is general throughout the *parganá*; but although the farmer

has no permanent interest in his tenure, it frequently happens that a lease descends for generations in the same family, until the farmer becomes imbued with the idea that he has a legal right to hold the lease of the village.

Gádi Pálganj, being situated in close proximity to the Rámgarh estate, has adopted some of its customs. For example, in this *gádi*, the system is prevalent of reserving some of the best lands in each village for the head of the village; as also the custom of dividing the *ijbandári* lands of the villages into so many lots or *murís*, meaning the quantity of land a *man* of seed will sow, or about 13 *káthás*. Throughout the rest of *parganá* Kharakdihá the *rayats* pay rent only for the rice-lands which they cultivate, all the other species of lands, as well as the *mahuá* trees, being held by them free of rent. The measurement of the rice-lands is made by the pole of 9 feet long. Although, owing to the undulating nature of the country, the rice-lands vary in quality, yet the quality of the land is never taken into consideration, all rice-lands being assessed at an uniform rate, a certain proportion of every other class of land, and a certain number of *mahuá* trees passing to the *rayat* taking rice-land as a matter of course. In a few years this system will doubtless pass away and become obsolete. Each estate which comes under the Court of Wards is now regularly measured, each class of land being severally assessed; and *rayats* are no longer called upon to pay solely by the quantity of rice-land they cultivate, but due regard is had to the quality of the land in their cultivation. Maintenance holders and *mukarrarídárs* pay their rents in cash; farmers and *rayats* partly in cash and partly in kind. There are 11,523 cultivators' holdings in *parganá* Kharakdihá. Of these, nearly the whole number have rights of occupancy, but few or none can claim to hold at a fixed rental. Of the above number, 2120 are holdings in the Government resumed villages and *gádi* Khargáli (also a Government village). There are at present four estates under the Court of Wards, viz. Dhanwár, *gádi* Gáwan, *gádi* Askoh, and *gádi* Jarridih. The proprietor of Dhanwár is a lunatic, and his estate was taken under the Court of Wards under the provisions of section 9, Act XXXV. of 1858. The other three estates belong to minors, and are managed under the provisions of Act IV. (B.C.) of 1870.

LAND TENURES IN KENDI.—*Parganá* Kendi constitutes a single estate entered as No. 45 in the Government rent-roll. It appears that this *zamíndári* existed in the Muhammadan times; and the ear-

liest available information shows that one Nahir Sinh was the holder at the commencement of the eighteenth century. At his death he was succeeded by his son, Fatih Sinh, who made a rent-free maintenance grant of 8½ villages in 1728. It appears that there existed three other maintenance grants of former dates, consisting of 22 villages; so that at the time of the Permanent Settlement there were four maintenance tenures of 30½ villages. Rájá Mani Lál Sinh, on succeeding to the *zamíndárí*, gave three villages as maintenance to his younger brother. The estate or *parganá* of Kendi consists of 126 villages, of an area of 45,000 *bighás*, and was settled with Rájá Hirálál Sinh in 1790, at a rent of *sikká* Rs. 2030-9, which would be equal to current Rs. 2166-2-1; Hirálál Sinh was grandson of the Rájá Fatih Sinh named above. This is a regular *zamíndárí* tenure, without any of the incidents attached to the other *zamíndárís* of the District, and was treated freely as such before the formation of the Chutiá Nágpur Agency. In the other parts of the District, we find that the police used to be paid by the *zamíndárs*, but such was not the case with Kendi. Within the estate the *thánd* of Kanhachatí, now made an outpost, was always wholly maintained by Government; and the laws of partition and mutation were fully in force in the estate. Even during the lifetime of Rájá Hirálál Sinh, who died in 1823, 8 of the 126 villages comprising the estate were sold by him to five parties; and the sales were recognised by Government by the entry of the names of the purchasers in the collectorate registers, the acceptance of revenue for the villages sold separately, and the granting of separate receipts for revenue to them. These villages, however, were never entered in the *tauji* as separate estates, and they are therefore now of the description called *shámilát táluks*. After the death of Rájá Hirálál Sinh, the *zamíndárí* passed into the hands of his son Rájá Manilál, who, between the years 1823 and 1834, when the Chutiá Nágpur Agency was created, alienated and caused the separation of revenue of 15 lots, comprised of 20 more villages, increasing thereby the number of *shámilát táluks* in his estate from 5 to 20.

Another peculiarity in this estate is the extraordinary number of instalments fixed for the payment of revenue, viz., 11, running from September to July; August being the only month in which no instalment of revenue is payable. After the formation of the South-West Frontier Agency in 1834, the old system continued till 1842; and in this interval Rájá Manilál Sinh created by alienation 12 more

shámilát táluks, composed of 11½ villages. But after that year Colonel Ousley, then Agent to the Governor-General in the Province, raised, under Regulation XIII. of 1833, objections to the procedure; and since then the recognition of such alienations has been refused. His order, however, did not become well known to the people till 1848, and in this interval the Rájá had sold seven villages. The purchasers of these seven villages made applications for the recognition of their interests, but their prayers were not granted. These people, therefore, pay their revenue to Government through the Rájá, who, however, derives no profit thereby, as the purchasers pay him the Government revenue only, and nothing more. In point of fact, therefore, these seven villages are *shámilát táluks*, though they have never been recognised as such. They are therefore classed with the *mukarrarí* tenures in the estate.

The non-recognition of these last sales caused the introduction of the system of *mukarrarí* settlement of villages in this estate. The *zamíndár* appears to have been either very badly off or very extravagant, for from the very beginning of the English rule, he has been always raising money by the sale of his villages or by otherwise alienating them. From the date of the Permanent Settlement to 1847 he raised money by the sale of villages. But when Government refused to recognise such sales, and the capitalists would not accept deeds of sale, the *zamíndár*, in consideration of a certain sum paid at once in cash, leased the villages in perpetuity on a fixed low rent, thus creating so many *mukarrarí* holdings. Besides the seven sales not recognised by Government, Rájá Manilál Sinh, and after his death in 1862, his grandson and heir Rájá Siblál Sinh, the present incumbent, have created 37 *mukarrarí* holdings, composed of 34 villages.

Rotation of Crops is practised only on the class of upland known as *tánr*. I am informed that the practice is perfectly feasible on the higher varieties of rice-land, but it is seldom resorted to, and season after season those lands are planted with rice only. The common system of rotation is as follows:—In the first year, *kurthí* or *surgujiá* is grown, followed in the second year by *kodo* or *til*. In the third year the land is either allowed to lie fallow, or is planted with a crop of *masuri*.

Operation of Act X. of 1859.—Owing to the peculiar conditions of agriculture in Hazáribágh, and the amount of spare land that is available, the provisions of Act X. of 1859 have not been

generally set in motion, either by the landlords to enhance rents, or by the cultivators to establish rights of occupancy. The reasons for this abstention from legal proceedings are clear. On the one hand, it is not to the landlord's advantage to eject from his holding a *rayat* who could readily obtain land in another village. On the other, the cultivators do not as a rule obtain such rights of occupancy as are defined by the Act. The right which an old-established *rayat* considers himself to have acquired, is not that of occupying a specific plot of land, but of cultivating a certain quantity of land within the village boundaries. The actual position of his holding may, however, change year by year. In the concluding portion of the paragraph on Classes of Land (pp. 98, 99), I have referred at length to this system of shifting cultivation. Here it is enough to notice the legal consequence of the practice—that it prevents the cultivators from acquiring a technical right of occupancy under Act X. It may fairly be inferred that, as education spreads, and the pressure of population on the land increases, the practice will die out, and cultivators will in self-defence endeavour to acquire the ordinary legal right of occupancy.

MANURE.—All the varieties of upland and the poorer sorts of rice-land are manured by those who can afford it, with a mixture of cow-dung, house sweepings, and ashes. Fifteen *maunds* can be laid on at a cost of R. 1 per *bighá*. Rice is also indirectly manured to a slight extent through the practice of leaving more than half the stalk standing, when the crop is cut, to be subsequently eaten off by cattle.

IRRIGATION.—Two modes of irrigation are in general use—the *kachchá* well, and the *áhrá*. A *kachchá* well is a hole dug some 8 or 10 feet deep, at a cost of about Rs. 5 (10s.) It is reckoned that one such well can be made to irrigate five *bighás* of land. The brink of the well is sometimes enclosed in a rough framework of wood, so as to keep out more surface water. An *áhrá* is a small embankment thrown across the upper and narrower end of the trough-shaped depression that lies between two ridges of land. It thus forms a reservoir at a high level, from which all land lying below the *áhrá* may be irrigated as long as the water lasts. Land situated above the embankment and on the brink of the reservoir itself is called *áhrá ká dhubá*, and can easily be irrigated by a lift. It runs, however, as the name implies, some risk of being swamped if the water suddenly rises. Land immediately below the embankment, known as *áhrá ká pinda*, is kept moist by the percolation of

water through the soil. A good-sized *áhrá* will hold water all the year round; while a small one, especially if much used for irrigating cold weather crops, will be dry by the middle of the hot season. The water is led on to the land by *páins* or small drains, taken round the wings of the *áhrá* on either side. It is only when the water has fallen too low to be drained off in the *páins*, that the embankment itself is cut.

On the general question of irrigation the Deputy Commissioner, Colonel Boddam, has expressed his opinion that no comprehensive scheme would be feasible, except by so large an expenditure of capital, as to involve virtually prohibitory rates for the water supplied. Of the truth of this opinion there can be no doubt, as the irrigation of a really large area could not be effected without building aqueducts to lead the water over intervening valleys. He thinks, however, that embankments larger than the ordinary *áhrá* or native reservoir, though small in relation to any of the Government irrigation works in other parts of India, would enhance the out-turn of the rice crop, and operate as an efficient natural safeguard against the recurrence of famines. One such embankment has been half completed on the Dhanwár estate in *parganá* Kharakdihá, now under the management of the Court of Wards. A dam a little more than half a mile in length, with a maximum height of forty-four feet, has been thrown across a small stream, which in the rains is about fifty feet wide and eight feet deep, while in the dry season it dwindles to a mere brook. Up to the point where it is crossed by the dam, the stream is estimated to take the drainage of an area of about four square miles. The reservoir to be formed above the dam will occupy an area of one hundred acres. Below the dam there is a gentle and unbroken slope of three square miles of country, all of which will be easily irrigable throughout the year. The cost of making the embankment was largely augmented by the circumstance that it was thrown open as a relief-work during the recent famine; and it is estimated that as much as £3000 will have been spent on it by the time it is completed. Notwithstanding this, the present manager of the Dhanwár estate anticipates that the increased rental derived from the land brought under irrigation will yield a return of more than fifteen per cent. on the capital expended. It is not quite clear whether allowance has been made in this estimate for the amount of land above the dam, that will be withdrawn from cultivation by being occupied by the reservoir. But a certain amount of this area consisted of the bed of the

stream, and of uncultivable rock and ravine; and the loss of this ground will be in some measure replaced by the amount of [illegible] fertile *tarrá* or water-side land, which will be brought into cultivation along the edges of the reservoir. That a scheme of this nature is perfectly consonant with native ideas, will appear from the fact that several successive Rájás of Dhanwár attempted to dam this particular stream; and that the cultivators express their entire readiness to pay enhanced rates of rent for land which commands a perennial supply of water. Should the project prove a success, it will also have been a measure of the kind of irrigation schemes which are best suited to the requirements of the District.

Natural Calamities.—Blights and floods are unknown in Hazáribágh District. The conformation of the country, and the extremely rapid discharge of surface drainage, would render such a calamity as a flood impossible, except for a very short time and within the narrowest limits. Nor would a general failure of crops from drought be possible, unless the entire local rainfall were suspended. No amount of rain that could fall would cause even the lowlands to suffer, while the greater the fall of rain the greater would be the fertility of the highlands. On the other hand, in the event of a deficient supply of rain, the crops on the lower levels would to a large extent make up for the sterility of the higher lands.

Famines.—The great famine of 1866 did not very seriously affect Hazáribágh District. The price of rice did not rise above 10 *sers* for the rupee, or 11s. a cwt., until relief operations had commenced. Even then the distress was only among the poorest classes, such as agricultural day-labourers, and serfs (*kamiás*) who had been cast adrift by their owners to shift for themselves. The great body of cultivators, although obliged to be careful and even to stint themselves of food, were at no time in real danger of starvation.

Famine Warnings.—The Deputy-Commissioner is of opinion that the prices current in the District cannot be relied on to give a warning of famine. The people are dependent, not upon one crop, but on three. Thus in the cold weather, wheat and barley, grain, *kurthi*, and *arhar* are grown; in the spring, Indian-corn, *janirá*, *marud*, and other millets; and lastly, in the autumn and winter there are the *lahshan* and *jarhan* crops of rice. Moreover, many of the grains on which the poorer classes subsist never come into the market at all. A two years deficiency in the rice crop followed by a rainless cold weather might be taken as a warning of distress, or even

of famine, if the early June rain fell short and caused a failure in the crop of Indian-corn, *janirá*, and *maruá*.

The Deputy-Commissioner thinks that the means of communication are not sufficient to meet the emergencies of a famine; and anticipates that it would be found impossible to send supplies to the more remote parts of the District, except in the cold weather. Owing to the broken nature of the country no comprehensive scheme of irrigation is feasible, except at a cost which would involve charging very high rates for water. Small embankments (*áhrás*) may with advantage be made all over the country, but this is a measure which must be left to the landholders to carry out. Government might, however, with advantage put a stop to the wholesale extirpation of jungle which now goes on.

FOREIGN AND ABSENTEE LANDHOLDERS.—The Deputy-Commissioner reports that there is only one Muhammadan proprietor in the District, who pays a land revenue of Rs.581 a year. With the single exception of this man, who lives in Gayá District, all the landholders reside on their own estates. All the Europeans who occupy land in Hazáribágh are tenure-holders under superior landlords; and, therefore, are not entered on the land-revenue roll of the District.

ROADS.—The principal roads in the District, with their length, are returned as follow:—(1) Portion of the Grand Trunk Road, from the 195th to 268th mile-stone, 72 miles in length, with a general direction of north-west and south-east. "This road, once the great line of communication between Calcutta and the Upper Provinces, enters Hazáribágh District at Madhupur *chatti*, which is situated immediately to the south of Párasnáth Hill, and passes into Gayá District at the Guárí *nadí* shortly after descending the Dhanwá Pass." (2) Road from Girídí railway station, joining the Grand Trunk Road at the Dumrí outpost, 27 miles in length. (3) Road from Hazáribágh to Bagodar police station on the Grand Trunk Road, 32 miles in length. (4) Road from Chatrá to Chaupáran, 30 miles in length. (5) Road from Barhí to Hazáribágh and thence to Ormánjí, the southern extremity of the District, crossing the Dámodar river at Rámgarh by a ferry; 62 miles in length. "The breadth of the Dámodar, where this road crosses, is about 200 yards; the bed of the river is hard gravel and rock, and there are no quicksands at this spot; the banks are generally steep. One small ferry-boat is kept here during the rains; but is only required during the continuance of, and immediately after, heavy rain. The Dámodar soon runs

down after the rain ceases. After crossing the Dámodar, three miles beyond Rámgarh, the ascent to the extensive plateau of Chutiá Nágpur commences; the *ghát*, locally called Chhotá Pálu Ghát, is about 1½ miles in length, and the change of elevation is about 700 feet. The road, which winds along the sides of a spur, is very liable to be cut up during the rains, and each season requires annual repair to keep it practicable for carts. This *ghát* would be exceedingly difficult of defence, the jungle on both sides being very heavy, and the adjoining spurs from the plateau very intricate. The road itself is commanded by the adjoining spurs along its whole extent. The road passes from Hazáribágh District into Chutiá Nágpur, a little beyond the top of the *ghát*."

The Minor Roads in the District are the following:—(6) Road from Rámgarh to Golá, 14 miles in length; (7) road from Bandi to Id (part of Ránchí and Govindpur road, situated within the District), 32 miles in length; (8) road from Barhí to Gáwan, 48 miles; (9) road from Pitíj, the continuation of the old Benáres road, 11 miles; (10) road from Bálumat to Sherghátí, 50 miles; (11) road from Hunterganj Police Station to Gorághát, 12 miles; (12) road from Chatrá to Daltonganj, 28 miles; (13) road from Chatrá to Kundá, 16 miles; (14) road from Pahárpur to Bagodar, 32 miles; (15) road from Kodarmá to Jainagar, 7 miles; (16) road from Rámgarh to Jainagar, 10 miles; (17) road from Itkhurí to Padmá, 12 miles; (18) road from Bishengarh to Gumiá, 18 miles; (19) road from Girídí to Tundí, 24 miles; (20) road from Mahesmundi to Bengábád, 14 miles; (21) road from Sardam to Dorandá, 6 miles.

Of the foregoing twenty-one roads, the first five are under the management of the Public Works Department. All the others are under local management, maintained partly at Government expense and partly from the proceeds of local funds. The total length and annual cost for repairs of roads are not returned by the Deputy-Commissioner; but it appears from the above list that there are about 400 miles of roads in the District, maintained at an average annual cost of about Rs.44,000. Besides the ferry at Rámgarh *ghát*, where the road from Hazáribágh to Ránchí crosses the Dámodar river, there is another ferry at Barákhar, where the road from Girídí to Dumri crosses the Barákhar river. They are both under the Public Works Department, and were leased in 1874 at Rs.230 and Rs.148-11-9 respectively. No large market has lately sprung up along any of the above lines of road.

Railways.—The eastern portion of Hazáribágh District is traversed by twenty miles of railway, being a branch line from the East Indian Railway. Fifteen miles of this are used for the conveyance of passengers, and three and a quarter exclusively for the carriage of coal. The remaining one mile and three-quarters consist of sidings &c., at stations. The stations situated within the District, proceeding from Calcutta, are (1) Maheshmunda, (2) Giridí. There are also coal-wharves at Karharbárí and Srírámpur.

Coal.—Seven coal-fields are known to exist in Hazáribágh District. I quote the following account of them from the *Memoirs of the Geological Survey of India*. I have omitted the purely scientific portions, referring to the special geology of the unaltered sedimentary rocks known as the Tálcher and Dámodar series, and the short paragraph on the trap-dykes. With regard to these latter, it may be enough to say that they are stated to occur with great frequency, and to have impaired the coal through which they pass. Allowance is made, however, for this latter fact in the economic summary, which I quote at length.

"The Karharbárí coal-field was first brought to notice by Dr M'Clelland in 1848, and some coal was raised at the outcrop of several of the seams to test their excellence. Systematic working, however, was initiated by Mr Inman in 1851, who mined the bottom seam of coal at Rámnadí. This coal was all carted to the Ganges. In 1855 Messrs Ward & Co., railway contractors at Monghyr, held Kuldihá and Rámnadí, which Mr Inman formerly possessed. In 1856-57, the interest in these two localities was transferred to the Bengal Coal Company, who now possess in addition holdings at Dhobidih, Mukpitto, Satighát, Upardaha *ghát*, Domahaní *ghát*, and Bayrá. The most valuable part of their property is that west of Kuldihá, and mining operations in this direction are being vigorously prosecuted. The Rámnadí property is small, but it yields good coal, only a little inferior to that at Kuldihá. In 1862 the working of the coal-field ceased entirely; but in May of 1868, the Bengal Coal Company re-opened Rámnadí, and at once raised, in anticipation of the opening of the chord line of railway, a large supply of coal. In 1859, Mr T. F. Cockburn, one of the East Indian Railway Company's resident engineers, was appointed superintendent of their mining property at Karharbárí. Workings were advanced with great vigour subsequent to his arrival, and a very large amount of coal was carted annually to Lakhisaráí;

but previously to 1863, all such operations were suspended. [Both the Bengal Coal Company and the Karharbárí Coal Association are now (1875) working mines within the limits of this field.].

"The geographical position of the field is between the parallels of 86° 16′ to 86° 23′ E. long., and 24° 10′ to 24° 14′ N. lat., occupying a portion of the tract defined by the river Barákhar on the south, and the Usri, an affluent of it, on the east and north. It is bordered in its immediate vicinity on the south, south-west, west, and north-west by hills of metamorphic rocks; but on the north the ground is comparatively open, and the nearest hill of any magnitude is Khándauli, three miles distant. The surface of the field is broken by the rocks of the Barákhar group, which constitute Komaljor, Kheri, Bhadduá and Bálí hills, and two or three small rises in the extreme east and south-east. The general elevation above the sea-level can be approximately stated at 900 feet; the ground on the north-east and south rising gently to about 60 feet higher. The Suknid river and its tributaries, the Kumarsot, the Durdurwá, the Khákho, the Suni, the Khundihá and Komaljor streams, drain the entire area of the field, and pour their waters into the Barákhar. The local watersheds are so disposed that not one stream, taking its rise in or passing through the coal measures, falls into the Usri, although that river passes the eastern edge of the field, at a distance of not more than one or two miles. The catchment basins are small; and the rivers being near their sources, none of them contain any depth of water after the cessation of the rains. The Suknid, the Durdurwá and the Suni are very shallow; and, in ordinary seasons, dry up in January. The jungle which seems to have been once very abundant, is now much thinner, and it can only be said to hold its own beyond the boundary of the field. The inhabitants are principally Santáls, Kols, Bhuiyás, and the lower castes of Hindus. Excellent workmen may be recruited from them, but it will require much judgment to manage them, and establish a class of miners that may be depended upon.

"The boundaries of the field enclose a superficies of 11 square miles, the rocks of which belong to the Crystalline, Tálcher and Dámodar series. The Crystalline series is represented by two inliers; one upon which the village of Karharbárí itself is built, and another at the junction of the Kumarsot and Suknid streams, opposite Baksidih. The Tálcher and Dámodar, recognised easily by their special characters, are the only representatives of the unaltered sedimentary rocks. The first of these series, which is not coal-bearing, occupies

only a small part of the field. A computation of thickness of all the strata made by Dr M'Clelland gave a total of 2362 feet. Nowhere, however, does a section clear enough exist, by which a calculation could be made with any accuracy of the depth of the rocks in the field; but taking their general dip, and their stratigraphical disposition, it seems improbable that the thickness of the beds is so much as this.

"An analysis of the information which has been gathered tends to prove that the capacity of this field, as a coal-producing locality, depends upon the extent to which its lower seams are developed; and as the boundaries of the field have now been determined with sufficient nicety to calculate the area of the Barákhar group, we might, did these seams overlie each other continuously, readily estimate the amount of coal which exists. Accepting the thickness of the three seams at Passarabhiá as 32 feet, and the area of the Barákhars as 8½ square miles, they would contain about 2720 millions of tons. I have, however, already pointed out that the principal seams exhibit an irregularity in their sections—a characteristic of the Barákhar group wherever it is developed. Examining this point more in detail, we find that at Passarabhiá there is an excessive accumulation of carbonaceous matter which diminishes in every direction from that spot, at Bariádih, at Chunjka, at Kop, at Domahani, Upardahá, Lopsádih and Satí *ghâts*, at Rámnadí and in the Kumarsot *nadí*. In all the localities enumerated above, although at some places the seams have become so reduced, and the aspect of their sections so changed, that it is difficult to correlate them, still the general horizon at which they occur in the series shows that we have seams representative of the beds at Passarabhiá. The following table gives a ready idea of the thickness of these seams in various parts of the field :—

Locality.	No. of Seams.	Thickness of Seams.	
		Ft.	Inches.
1. Passarabhiá, . .	3	32	0
2. Bariádih, . . .	2	23	6
3. Chunjká, . . .	2	17	0
4. Domahani, . . .	2	11	6
5. Upardahá, . . .	3	15	0
6. Lopsádih, . . .	2	13	0
7. Satí	3	15	0
8. Rámnadí, . . .	2	12	6
9. Kumarsot *nadí*, . .	3	9	0

Taking the average of the above table at 16 feet, and multiplying by 8½ square miles, we reduce the amount of coal to 1360 millions of

tons. If we wish, however, to arrive at an estimate of the available coal, we have to consider collectively the size of the seam, the dip, the quality of the coal, and the effect of faults, dykes, and other troubles. The table below gives the thickness of the coals at every

Locality.	No. of Seams.	Thickness in descending order.		Workable thickness.		Remarks.
		Ft.	In.	Ft.	In.	
Bhandáridih, . .	2	4	0	...	...	The dip of these seams is too high for working economically; approximate thickness 10' 0".
		10	0	...	...	
Mohlichuan, . .	2	4	0	20	0	These thicknesses are averages.
		16	0	...	...	
Passarabhiá, . .	3	8	0	...	...	
		8	0	28	0	
		12	0	...	...	
Kuldihá, . . .	2	4	0	18	0	Average thickness.
		14	0	...	...	
Purtdihá *nála*, . .	2	3	0	...	...	Both these seams are too poor in quality to pay for working.
		7	0	...	...	
Chunjká, . . .	2	6	0	17	0	The bottom thickness is an average.
		11	0	...	...	
Khandihá, . .	2	1	0	...	...	The upper seam is approximately given.
		11	3	...	...	
Khandihá Hill, . .	2	13	0	...	...	Not available owing to badness of coal.
		6	8	...	...	
Kop, . . .	2	4	6	...	...	Eight feet is approximate. Both seams inferior.
		8	0	...	...	
Komaljor *nadi*, . .	...	...	...	...	...	All the seams are too small.
		3	0	...	...	
Purtdihá *nála*, .	3	9	6	...	...	The upper seam is too small. The two lower are worked at Bartádih.
		14	0	23	6	
Domahani *ghát*, .	2	2	6	...	...	Only the lower seam is available; thickness of the upper being too small for working.
		9	0	9	0	
Upardahá *ghát*, .	3	3	0	...	...	The two upper beds are not clearly seen. The lower seam is available, and it is of inferior quality.
		4	0	...	...	
		8	0	8	0	
Lopsádih *ghát*, . .	2	4	0	...	...	A small seam probably to be found nearer Bálí hill; the only bed available is the 8' 0" seam.
		8	9	12	0	
Sati *ghát*, . . .	4	2	0	...	...	The only ascertained thickness is that of the 2d seam. At its outcrop in the Khákho, it is strongly spotted with iron pyrites.
		4	0	...	...	
		8	9	12	0	
		1	0	...	...	
Rámnadí, . . .	2	1	4	...	...	This seam is scarcely more than carbonaceous shale.
		11	0	11	0	
Bálí hill, Bhaddua hill, Komaljor hill,	...	24	0	...	...	
Kumarsot *nadi*, .	3	4	0	...	...	All these are inferior seams of coal.
		3	0	...	...	
		2	0			

place mentioned in the memoir; and by excluding the non-workable seams, we shall be able to judge fairly what the field may be reasonably expected to yield. I exclude as unavailable all seams under four feet, and those the quality of whose coal would render them unprofitable. We thus see that over a very large section of the field the available thickness is only nine, twelve, and seventeen feet, and that such ground as that in the extreme north-east—near Mahtádih and north of the Komaljor *nadí*—may be looked upon as practically barren. The coals at Upardahá, Lopsádih and Satí *ghâts*, are also of an inferior quality, being shaly and strongly impregnated with iron pyrites. Fifteen feet of coal over the whole field, I should consider as not being too small an average. And deducting one-sixth of the total area for barren ground, and for ground where the overlying rocks are too thick to work the coal profitably, we have $7 \times 15 = 105$ millions of tons. From which, subtracting one-third for waste and loss by intrusion of trap, &c., 80 millions of tons remain as the probable available amount.

"The quality of the Karharbárí coal has been tested by several assays. The specimens which gave the best results were obtained from localities in the east of the field, where the coal is of better quality than it is in the south-west:

Locality.	Fixed carbon.	Volatile matter.	Ash.	Remarks.
Mohlichuan, . .	64·9	24·8	10·3	
Ditto, . .	68·6	24·8	6·6	
Ditto, . .	73·1	22·1	4·8	This was probably a picked specimen.
Passarabhiá, . .	68·5	19·0	12·5	
Bariadih, . .	66·3	23·0	10·7	
Chunjká, . .	67·2	24·0	8·8	
Bálí, . . .	50·9	15·1	34·0	
Ditto, . . .	48·2	12·6	39·2	
Khandihá, . .	57·1	16·4	26·5	
Rámnadí, . .	69·8	23·4	8·8	Caking coals.
Kuidihá, . .	71·8	24·0	4·2	

"The better seams represent a superior working duty to that of the coals of Ráníganj. The experiments, continued over three months on the East Indian Railway, proved clearly that the coals raised in the Karharbárí field were better than those obtained from the Ráníganj field. Since these trials were made, other seams have been opened out in the Ráníganj field, such as Sítárámpur, Sánktoriá, &c., which are much more nearly equal, if not quite

equal, to the Karharbárí coals. But so far as the trials went, the results showed that the coals of the Karharbárí field were superior to those obtained from Ráníganj, in the ratio of 113 to 100. The principal advantage afforded by the Karharbárí field is one of position, as a supplying area for the Upper Provinces and the stations west of Lakhisarái, there being a saving of 23 miles of carriage as compared with the Ráníganj coals. But this must be considered in connection with the available amount of coal, and the financial problem:—Will the saving in carriage over Ráníganj coals give a profit upon the expenses of railway construction, and price of lands?—still remains open to discussion. If the rate of consumption be assumed at 250,000 tons a year, the Karharbárí field has a life of about 300 years."

The East Indian Railway Company commenced working the Karharbárí Coal Mine in 1858. At the end of 1862 work was suspended chiefly on account of the want of carriage, and was continued in 1870. The out-put of coal up to June 1875 amounted to nearly 350,000 tons. At Karharbárí the company hold 7385 standard *bighás* on a lease from Government for 82 years at a yearly rent of Rs.50,729. At Srírámpur they have 4225 *bighás* on a perpetual lease from the Rájá, and pay an annual rent of Rs.4943-4-0. The Railway Company work the coal for their own consumption and not for sale. The miners are chiefly Bhuiyás, Báurís, and Santáls.

The Bengal Coal Company hold about 2000 *bighás* of land in Karharbárí, on a perpetual lease given to them in 1854 by a grantee of the *tikáit* or *ghátwál* proprietor of Karharbárí. They pay the low rent of about Rs.60 per annum.

"THE KARANPURÁ FIELDS, although now distinct and forming two separate basins, were originally one continuous tract. The denuding action of the Dámodar river has exposed an intervening strip of gneiss, that cuts off the one completely from the other. To each, therefore, it has been necessary to distinguish them The larger, I have called the Karanpurá, and the smaller the south Karanpurá field.

"The Karanpurá occupies, like the Bokáro coal-field, the low ground of the Dámodar valley at the base of the southern scarp of the Hazáribágh table-land. It is comprised between 84° 51′ and 85° 30′ E. long., and 23° 37′ and 23° 57′ N. lat., and covers an area of 472 square miles. Among the coal-fields of the Dámodar valley it is inferior in size only to the Ráníganj field; but though larger than either the Bokáro or the Jhariá, it is not so important economi-

cally. The total number of coal-seams decreases in going from east to west. The extreme length of the Karanpurá field is forty-two miles, and its extreme breadth is nineteen. Its outline conforms with considerable fidelity to the course of the scarp of the Hazáribágh table-land, which overlooks it on the north, and to the other metamorphic hills which limit it on the east, west, and south. The chief features in the physical appearance of the field resemble those of the Bokáro area. Tálcher, Dámodar, and Pánchet rocks occur, and each series exhibits that surface contour which is characteristic of it. Flat stretches of Tálchers contrast with the hillocks and low scarped table-lands of the Barákhars; and wide level expanses of ironstone shales, Ráníganj and lower Pánchet rocks, throw into bold relief the massive hill lands of the upper Pánchet. The most prominent hill of this latter series is Máhudi, which covers an area of 45 square miles, and is, therefore, much larger than Lugu hill in the Bokáro field. Separated only by the valley of the Chundru or Tendwá river, the Sátpahri hill occurs west of Máhudi. Its area is 12 square miles. The Danhu and Harhí hills belong to the same series as the larger hills, and they present much the same appearance, differing only in respect to size. Gerwa hill is the only one of any dimension that does not lie in the strike of the others. It is adjacent to the southern boundary in the west corner of the field. Beyond the field, the most important and conspicuous of the elevated areas are the Hazáribágh and Chutiá Nágpur table-lands, which form, respectively, the northern and southern natural physical boundaries of the coal-measure series. Their general height above the sea is 1900 to 2000 feet. Owing to the situation of the field so near to the head of the Dámodar valley, most of its drainage channels take their rise either within the area of the sedimentary rocks, or at a short distance beyond their boundaries. The only river of any dimension is the Dámodar. It enters the field near Mahlan, but it is not here the broad open river which passes by Ráníganj, but a small stream fifty yards in width. Its channel increases in size as it goes eastward, and when it leaves the south Karanpurá field opposite Changarhá, it is of considerable breadth. The chief water-sheds are the Chutiá Nágpur table-land, the Hazáribágh table-land, and the hills of Pánchet rocks in the middle of the field. All the northern tributaries of the Dámodar are thrown off by the two latter water-sheds, and they contribute the greatest body of water. The western range of hills that borders the Karanpurá area, and

in which the gradual ascent of the plains of the Dámodar valley culminates, is important as forming the water-shed between some of the tributaries of the Koel and those of the Dámodar river. From the configuration of the country surrounding the Karanpurá field, a student of physical geography would at once surmise that the number of streams traversing the coal-measures was very great. This is the case, and there is no field in the whole of the Dámodar valley that contains so many rain-channels as the Karanpurá. A rough estimate gives, for an area of 500 square miles, a river drainage of more than 2000 miles in length. All the streams are extremely shallow, and soon after the cessation of the rains contain only a small quantity of water, which usually dries up in the early part of the year. The most important tributaries of the Dámodar, on the north or left bank, are the Hoháru, the Chundru or Tendwá, and the Murpá river. Nearly the whole of the eastern part of the field is drained by the Hoháru and its feeders. It possesses several local names, being called, in addition to Hoháru, the Palándu, Barká, and Galgaliá *nadí*. The largest affluent of the Dámodar in the western part of the field is the Chundru. It exposes an excellent section of the various rocks, and affords several striking examples of the cutting power of water. From the south, the two largest streams that flow into the Dámodar are the Saphí and the Chattí; both of these rise in the Chutiá Nágpur table-land. The whole of the Karanpurá area is well covered by jungle; and according to the nature of the soil this differs in character. There are few large trees at present, the demand for charcoal to supply the wants of the numerous iron-furnaces and refineries leading to a great destruction of timber. The only locality where wasteful cutting is not allowed is on Máhudi hill, where the timber is yearly improving. The yield, however, will never be large enough to form a permanent supply for any great smelting works, nor for any considerable demand in the way of sleepers. The inhabitants of this District do not give promise of a good mining population. The greater number of people belong to castes that cannot be called low. There are only three villages of Santáls in the Karanpurá field; and these are remarkable as being the most advanced westerly settlements of this interesting people. Should miners, however, be required over and above the local supply, the District of Chutiá Nágpur, with its Kols and Mundas, would always be a good recruiting ground.

"The detailed examination of these Karanpurá fields has proved that they contain a very large supply of fuel, and are quite capable

of meeting any requirements which are likely to be made upon them for industrial purposes. With regard to their geographical position, they are conveniently situated between the towns of Hazáribágh and Ránchí; but the physical conformation of the country renders them difficult of access, in the ordinary acceptation of the word, from either of those stations. Occupying as the fields do the low level country of the Dámodar valley, and being hemmed in by table-lands and hills, it will require a considerable expenditure of money to open out a road for establishing communication between the valley and the upland. With reference to Hazáribágh, which is only fourteen miles distant from the nearest point of the Karanpurá field, the easiest routes to open out are either of the two *ghâts*, Mathra or Daini. In estimating the probable amount of coal contained in either basin, there is an element of uncertainty owing to the very few natural sections which are exposed. I think, however, that, in reviewing the evidence afforded by the Barákhar group in the larger field, it has been quite proved that there is a thickness of between 30 and 40 feet of coaly matter at about 300 feet or so above the top of the Tálchers. This is the most important band of coal and the one which is the main stay of the field; and if we make it the basis of our calculation, we shall arrive at a very reliable minimum estimate regarding the capability of the coal-field. The most constant subordinate band is about 10 feet thick, and occurs about 200 to 300 feet below the top of the group. In the Ráníganj series, there appears to be an available thickness of 20 feet. If we take 35 feet of coal, making deductions for partings, and grant its extension over an area of only 250 square miles out of the 470 included by the field, we have 8,750,000,000 tons of coal. In the south Karanpurá basin, there appears from the evidence of natural sections, to be a greater abundance of coal than in the larger field. If we examine the two sections of the Jainagar river, we find that in the eastern section, near the junction with the Dámodar, there are eight seams with a total thickness of 62 feet; whilst in the section south of the fault which crosses the mouth of the small feeder at the bend of the Jainagar river, there are sixteen seams with a thickness of 159 feet 3 inches. The discrepancy between the two sections is probably due rather to the broken nature of the exposure of the one as compared to the other, than to a rapid diminution in the thickness of the coal within such a short distance as that which separates them. I think it therefore safe to assume a thickness of

70 feet. Subtracting 20 feet for parting, and estimating this for an area of say only 15 square miles, we have 75,000,000 tons of coal. These two estimates are very far below the actual amount that these fields contain; but even at the moderate computation which I have made, it is evident that the Karanpurá valley can meet the probable industrial requirements of Upper Bengal for years to come. Regarding the quality of the coal, the following assay may be taken as giving a fair measure of the excellence of the better coals. The specimen is from the larger of the Gondalpurá seams:—Carbon, 64·5; volatile matter, 27·0; ash, 8·5. The amount of ash compares favourably with the ordinary Dámodar coals.

"*Iron ores* occur in abundance. Within the field there are two varieties—the clay iron ores of the ironstone shales, and the hæmatite of the Barákhar group. In the metamorphic area surrounding the field, magnetic iron ore is met with in several places. This variety of ores would be a great advantage to the iron manufacturer, by enabling him to use judicious mixtures, so as to produce every description of iron acceptable in commerce. The most abundant ore in the field is the clay ironstone of the middle group; and although no analysis of specimens from this field has been made, it has probably the same composition as similar ores from the Ráníganj area, where the average amount of iron is 35 per cent. The richest ores come from the Barákhar group, and yield from 50 to 60 per cent. of iron. The following list gives the percentage of iron of several different varieties of iron ores collected by Mr Donaldson, and assayed by him at the Geological Survey Office by Mr Tween:—(1) Che[illegible] Jugrá, 56·8; (2) Arahárá (stream), 42·12; (3) Gondalpura (2 [illegible] seam), 37·3; (4) Mandu, 33·8; (5) Belhárgadá, 30·6; (6) Dám[illegible] river (12 feet seam), 25·6; (7) Mairan Kalan, 18·4; and (8) [illegible] hárá, 11·2 per cent. The magnetic iron ore must be looked [illegible] the metamorphic rocks. It is the purest form of iron or[illegible] usually contains from 65 to 70 per cent. of metallic iron. [illegible] manufacture of iron is one of the chief industrial feature[illegible] Hazáribágh District. Villages exclusively inhabited by Agariás (iron-smelters) are often to be met with, and the number of furnace[illegible] which are kept at work exceeds two hundred. The busiest season is the cold weather, as during the rains most of the men are engaged in cultivation.

"*Limestone.*—This important material, so essential as a flux, although found along the edge of the field in many places, does not,

I am afraid, occur in sufficient quantity to be available for large works for a lengthened period. *Kankar* occurs over a large area of the Karanpurá field, but it is difficult to collect, and is of no great thickness. It is found along the banks of nearly every river. The most important accumulations of fresh-water limestone, that I met with, occur where the Beltu river falls over the face of the Hazáribágh scarp, and in the Daini *ghát*. Some crystalline limestone of very fair quality is exposed at the southern edge of the metamorphic inlier near Tungi (in the south Karanpurá field), and also near Raí in the Karanpurá field proper. Very siliceous limestone, of little practical use, is met with on the table-land of Hazáribágh."

BOKÁRO COAL-FIELD.—"The river Bokáro, whose valley extends along the foot of the southern scarp of the Hazáribágh plateau, gives its name to this coal-field. Mr Williams, who first geologically examined this portion of the basin of the upper Dámodar, conferred the title, for the reason that the river Bokáro flows for a distance of 27 miles through the field, and is the stream of greatest importance draining the area to which this report refers. Perhaps it would have been better, however, if he had chosen the name of the lofty hill of Lugu to indicate the field. Standing, as the hill does, in the middle of a plain and rearing its summit far above any other eminence in the neighbourhood, it is the most prominent natural object which meets the eye for miles around. The portion of country occupied by the Bokáro field is comprised between 85° 30′ and 86° 10′ E. long. and 23° 40′ and 23° 50′ N. lat., and covers an area of 220 square miles. Its greatest length is in an east and west direction, and is about 40 miles; its maximum breadth from north to south does not exceed 6½ miles. The boundaries are distinct and well marked. Bounding the field to the north is a chain of hills composed of gneiss, rising in some instances to a height of 3000 feet above the level of the sea. This continues unbroken from the eastern to the western boundary of the field, and then sweeps round, taking a north and south direction, cutting off the coal-measures on the west. This chain is not an independent one, but is connected with the Hazáribágh table-land at intervals, where the activity of the denuding forces has been less than at other places. The southern boundary is formed by another range of hills; not nearly so conspicuous and elevated as the northern one. Lugu hill, and the higher peaks of the Hazáribágh table-land, furnish much excellent timber; and

so brisk is the demand at present that the most inaccessible crags are scaled in order to procure the *sisu* and *sál*, which are the two varieties of trees most sought after. A considerable profit accrues to those *zamíndárs* who possess the right of felling timber; but the indiscriminate manner in which cutting is being carried on is very much to be regretted. The drainage of this area is effected almost entirely by the Bokáro river, which falls into one of the principal tributaries of the Dámodar—the Kunar. This latter stream passes through only a small portion of the eastern part of the field, and joins the Dámodar opposite the village of Kheto. Its geological interest is marred by the imperfection of its section, and the almost total absence of any exposure of coal along its banks diminishes its importance for our purposes. The principal river, in fact, is the Bokáro; and its northern and southern water-sheds are the only ones in connection with the physical geography of the District, which belong to the field. The northern water-shed is identical with the outer scarp of the Hazáribágh table-land, of which Jilingá hill is the highest point. The largest body of water furnished to the Bokáro is derived from the area to the north of it. Its feeders, however, are few and small, drying up at the commencement of the cold weather, so that the Bokáro never contains any large volume of water, except during the rainy season. The southern water-shed is very faintly indicated (if we except Lugu hill) by slightly rising ground between the true river valleys of the Bokáro and Dámodar. There is a superior interest attaching to this area, as compared with the Jhariá field, from the fact of the development of a higher series of rocks, and from the discovery, and confirmation, of apparent unconformable overlap between the several groups and formations which occur here. Hitherto our classification has been to a great measure one dependent upon lithology, although not entirely so; and it is a matter of congratulation that this is now borne out by collateral evidence of a less arbitrary kind. The area occupied by the field is excessively narrow. Coincident with this, it is found that the strata occurring within its limits are highly disturbed in many places, and that flexuring and faulting exist to so large an extent that the stratigraphical relations of the beds become greatly confused and complicated. The series represented are the Tálcher, Dámodar, and Pánchet.

"Dr Oldham has already, in the Return of the Coal Resources of India, called for by the Secretary of State for India, alluded to the

probable amount of available fuel which the Bokáro field can yield, namely, 1500 millions of tons. The whole of this coal is furnished by the Barákhars; the Ráníganjs being incapable of supplying any serviceable coal. This decrease in the value of the Ráníganj group as a coal-bearing series, was noticed in the Jhariá field; and from thence westwards, it has been determined that its importance comparatively to the Barákhar is exceedingly small. The most productive portion of the field lies between the river Kunar and the eastern boundary. It is in that area that the largest coal-seams crop out, and the dips are most favourable. Coal has of late years been regularly cut near the villages of Charhí, Phusro, Tapin-Pindra, and Bangahrá, to supply fuel for burning bricks in Hazáribágh; and some has been carted to Gayá; but the worst and most stony variety has been invariably chosen by the native contractors. Among the fields of the Dámodar valley, which have already been examined and reported upon, the Bokáro stands third in order of importance."

THE RÁMGARH COAL-FIELD.—"The coal-field which is described in the present report is situated in Rámgarh *iláka*, District of Hazáribágh, and occupies a portion of the valley of the Dámodar river lying between the meridians 85° 30′ and 85° 45′ E. long. The ly recorded geological notice of this field is contained in one of ate Mr Williams' papers. In the year 1848 he paid a flying when, from the fact of its vicinity to the old town of Rámgarh, ve it the name which we retain as above. Impressed with a as to its unimportance in an economic point of view, owing to erior quality of the coal which he saw, he appears to have nost of his attention to the more productive field lying to the f it. The tract of country which includes the Rámgarh and fields contrasts strongly both with that on the north and e south. Though by no means devoid of elevations, there eneral flatness of feature prevailing throughout. On n the one hand, there are the Jilingá and other ranges and the remarkable plateau upon which the Station of bágh is placed; and on the south, a well-defined scarp which ls the hilly country included in Chutiá Nágpur. The principal is the Dámodar or Deonad; which, outside the area of the coal- is characterised by having sandy reaches from one-third to half e wide, and from one to two and sometimes even three miles Within the coal-field, however, the bed is much narrower,

and frequently so rocky as effectually to settle the question of the unsuitability of the river as a means of conveyance for either timber or coal. The tributaries of the Dámodar within the limits, or in the immediate vicinity, of the coal-field, are of trifling length. They are, however, very numerous; owing to which circumstance, it frequently happens that a few hours heavy rain is sufficient to convert its otherwise narrow stream into a raging torrent, which can only be forded with a considerable amount of risk. North of this portion of the Dámodar, the water-shed follows a line nearly coincident with the southern boundary of the Bokáro field. On the south, the range of hills alluded to above constitutes the water-shed which separates the tributaries of the Dámodar from those of the Kásái and Subarnarekhá.

"The total area of this field does not exceed forty square miles; its greatest length in an east and west direction is fourteen, and its greatest width, north and south, about eight miles. Towards the western boundary, or in the neighbourhood of Rámgarh, the rocks have been much disturbed and thrown by faults. In the remainder of the area, however, they have only been to a small extent affected in this way. As in all the other Dámodar valley coal-fields hitherto described, the southern boundary, or the chief part of it, has been formed by a fault. Its maximum downthrow has been sufficient bring down but a fraction of the full thickness of upper Dám rocks to a level with the metamorphic series; indeed, pe strictly speaking, the existence of these beds at present is directly due to a cross fault. No trace of the Pánchet series re all having been swept away by the denuding forces, from action of which they were unprotected. Owing to the peculi in which the rocks have been cut off by the southern fault, tremely difficult, except in the case of the ironstone shale mate, with any degree of certainty, the thickness of the seve The following is as near an approximation as can be Tálcher series, 850 to 900 feet; (2) Dámodar series—Bara 3000 feet; ironstone shales group, 1200 feet; Ránígan gr known.

"The boulder conglomerate which occurs at the base of the cher rocks has given to the series an interest which it could otherwise have possessed. The manner of its occurrence in field tends further to endorse the truth of the theory, now pretty established, of its being a shore deposit. The characters whi

exhibits, and which separate it from all the other rocks of the series, indicate the presence, at the time of its formation, of certain conditions which were not continued throughout the period. These conditions were the existence of boulders and weathered masses of gneiss, the accumulation of ages, which formed a *talus* resting on the flanks of the metamorphic hills. Upon this *talus*, as the waters advanced over the sinking surface, silt was gradually deposited; and when it was covered up, the formation of silt-shales and sandstones proceeded without interruption, the hills still forming islands, or, in the case of ranges, the boundaries of estuaries.

"This field is of but small value in an economic point of view. The coal in the eastern part occurs generally in thick seams, some of them having low dips; but the quality is so variable, thin bands of coal frequently alternating with strong carbonaceous shale, that it is improbable that the former, even under the most ...ourable conditions of market and carriage, could ever be extracted ... profit. In the western extension of the field, where the coal is ...nly of a workable thickness, but also of much better quality, ... high dip and the cutting off and crushing up of the seams by ...aults, cause them to be even less likely to produce a profitable out...urn of coal. It does not seem probable, therefore, that the Rámgarh ...l-field will ever be worked to any great extent. The usual car...aceous ore of iron is found in the ironstone shales; it is, how...r, of an inferior quality, and its abundance is below the average ...nd in other fields."

ITKHURÍ.—"The area of the coal-bearing rocks of Itkhurí is so ...ery small, that it would probably have escaped examination for som... ...ears to come, had not the attention of the Deputy Commissio... of Hazáribágh (who communicated to the Geological Survey the knowledge of the existence of coal at Itkhurí) been specially drawn to the fact by a quarrel which arose between two petty *zamíndárs*, ...egarding the proprietorship of the land in which the coal occurred. The designation of the field is derived from the name of the somewhat considerable village of Itkhurí, which, although outside the boundary of the coal measures, has been preferred as being better known than any of the villages within the limits of the field.

"In addition to a few patches of laterite, only two series of rocks occur, the Talcher and the Dámodar. Out of the total area of the field, the former series overspreads the whole with the exception of ...lf a square mile or so occupied by the Dámodar, and a similar

area occupied by laterite. The general features are the same as are elsewhere produced by these rocks; the Tálchers form flat ground, and the Dámodars—which are here represented by only the Barákhar group—determine a slight rise. The country around the fields to the east and south is open, but towards the north, the hills and ravines succeed each other so rapidly that cultivation is only practicable in a few localities; and an almost unbroken jungle of sixteen miles in breadth extends nearly to the very edge of the Grand Trunk Road. The field lies at a very much less elevation than the plateau of Hazáribágh, and corresponds nearly with the level of the Karanpurá coal-fields, more to the south. Its greatest length is fifteen miles, and its average breadth one and a half. The principal river valley is that of the Mohaní, a stream which forms a part of the drainage system of the Phálgu or Gayá river.

"The best of the three seams of coal which this field contains is the four feet bed of the section in the small stream. But none of t coals are worth working for any other purpose than for rough w The average would, I consider, contain more than 30 per of ash. The area of the coal-bearing portion of the field is v small, but its position and the fact of a direct metalled road passin by Itkhurí from Chatrá to the Grand Trunk Road, are points in it favour. The Public Works Department might very profitably qu some of the coal, and use it instead of firewood for performing w in connection with the construction of culverts and bridges, with reasonable distance, not only on the Chatrá road, but on the Gra Trunk Road; and, I heard, when making inquiries on the spot, th al was profitably carted to Sáhibganj (Gayá) for burning brick d lime. A very rough estimate of the amount of coal available, such as it is, gives about a million and a half to two millions of tons. Besides the laterite, much of which contains a large percentage of iron there are veins of magnetite, and deposits of hæmatite, scattered through the crystalline series. The Barákhars in this area do not contain any iron ore; the rocks of the group here belonging to the level which comes just below the beds which, in the Karanpurá field, yield so much of the iron ore worked there. I could not recommend the utilisation of any of the Dámodar sandstones. They are too free, and too fissile to last long. The crystalline series can yield much stronger and much more ornamental stone."

"CHOPÉ is a small coal-field which is situated in the valley of the Mohaní river, about eight miles in a direct line, a little north of wes

from the station of Hazáribágh. It is thus well within the limits of the Hazáribágh plateau; and its elevation is scarcely less than that of the station, or about 2000 feet above the level of the sea. The principal village in the vicinity, Chopé, has furnished the name which has been adopted to indicate this area of coal-measure and associated rocks. During the early part of 1869, Dr J. M. Coates, Superintendent of Jails in Hazáribágh, devoted a considerable amount of time to the examination of the country surrounding the station of Hazáribágh. With the help of natives he succeeded in discovering several deposits of iron and lime, and also the seam of coal to be described in the following paragraphs.

"The area occupied by the coal-measures and underlying Tálchers which constitute the Chopé coal-field is of an irregular triangular shape, covering about three-fourths of a square mile. It is thus the smallest detached coal-field known in India. The coal-field is approached from Hazáribágh by a road which, for the most part, passes over alluvium, but in its vicinity there are occasional outcrops of metamorphic rocks, some of which are accompanied by extremely rich deposits of iron. For some distance on either side of the Mohaní, the ground is much broken up into ravines and covered with jungle, both of which tend to obscure the position of the boundaries. Fortunately the greatest depth of the area from north to south is traversed by the Mohaní, the section in which affords a clue to the structure otherwise completely hidden.

"There are two distinct portions of the Barákhar group existing in this field. One, the higher, let down by a pair of parallel faults, and the other resting immediately on the Tálchers. In the former, the coal or coaly shale which has attracted attention to this locality lies in a trough dipping at first 35° to 10° west of north, falling rapidly to the horizontal, and where seen near the Tálchers, it has a dip in the opposite direction of about 15°. The coal, as stated above, is about four feet thick, the remaining forty to forty-five feet of Barákhars being made up of carbonaceous shales and sandstones. As to the poor quality and extremely limited amount of this coal there can be no doubt; possibly a portion might be made use of for brick and lime burning, but I regret to say that I can give no hope of a useful fuel for general purposes being found in this locality. It will, I believe, be cheapest in the end for those in Hazáribágh who may require coal even for the inferior purposes above mentioned, to draw it from the more distant, but vastly richer, Bokáro and Karan-

purá fields. The metamorphic rocks in the vicinity of the above-described field consist, for the most part, of granitic and hornblendic gneiss, with occasional rich lodes and interstratifications of magnetic iron ore."

IRON is smelted at many places in the District, both in Kharakdihá and Rámgarh. The furnace used is an upright cylinder of brick about the height of a man; and the blast is drawn from a double bellows, on which the smelter stands and presses down the valves alternately with his feet. In 1863, Tandawá, 10 miles north of the Dámodar in *parganá* Karanpurá, was the chief seat of the iron-smelting industry. As many as twenty-three *bháttis* or foundries were at work during six months of the year, turning out on an average 2 *maunds* or 164 lbs. of iron a day. The return of metal obtained was about 40 per cent. of the ore that passed through the furnace. The iron was sold at Rs. 3-8-0 per *maund*, being bought largely by dealers for export. All weapons and implements required in the District were made by village smiths from iron thus smelted; and the local demand left a surplus of about 50,000 *maunds* for export to Behar. The smelters of iron were mostly Lohárs and Kols. The former claim to be Hindus, but probably have a large admixture of aboriginal blood in their veins. In 1849, the terms of the iron trade were far less favourable to the smelters than described above. The Lohárs and Kols supplied the manufactured iron at the rate of two *maunds* and a quarter for the rupee; and were paid on the spot by the *mahájan* in rice, at the rate of from two rupees to two rupees and a half per *maund*. Thus for every *maund* of rice the *mahájan* got from four and a half to five and a half *maunds* of iron, but he had to bear all the expenses of transport. None of the iron-workers owned or cultivated land. In consequence of the exhausting nature of the work, little or no smelting went on in the hot weather or the rainy season. In 1870, Mr Donaldson was deputed to report on the iron and coal deposits near Hazáribágh, with reference to the possibility of working the iron by means of convict labour. His opinion was that iron worked up in Hazáribágh could be delivered at Madhupur at a cost of two-thirds less than iron imported from England. No action, however, was taken upon this report, as it was found that the employment of convict labour upon iron-smelting could hardly be reconciled with any regular system of jail labour.

TIN is found, as far as I have been able to ascertain, only in Lorangá on the south bank of the Barákhar river, five miles south-west

of Barkatta. Dr M'Clelland, who visited this spot in 1849, writes as follows:—"Native oxide of tin is found disseminated in gneiss at the village of Lorangá in the Pálganj *zamíndárí*, on the south bank of the Barákhar, within a few miles of the town of Palámau. The place where the tin ore occurs, is elevated 1500 feet above the level of the sea, and not above twelve or fourteen miles from the *dák* bungalow, called Dumrí, on the Grand Trunk Road; so that it possesses some advantages, both as to climate and means of access. The spot affording indications of the ore is 500 yards distant from the village, about 100 yards in breadth, and of indefinite length, extending probably in the direction of the strata. The ore is found in nodules of imperfect crystalline form, from a few grains to an ounce and upwards in weight, intermixed with gravel. From its great weight, the ore remains *in situ*, after the softer ingredients of the rock which enclosed it are washed away by the fall of rain. It is also found in small ruts, intermixed with gravel. There are upwards of forty iron furnaces in the village, all of which were extinguished on my approach. Those by whom the works are carried on positively declined to give any information whatever regarding the tin ore, although I had learned something on the subject from the people of a neighbouring village. From this very unusual incivility, I was led to suspect that the furnaces above alluded to were, some of them at last, employed in the reduction of the tin ore, and that the iron business was a mere pretence to cover a more lucrative trade." I note another account from a paper by Mr F. R. Mallet, in *Records of the Geological Survey of India*, vol. vii. part i., 1874:—"Tin-ore was worked some years ago at Nurgo, a village just south of the Barákhar and about three miles from Ledá (eight miles west of Barharbárí). The original discovery of the tin appears to have been purely accidental on the part of some Kols, who having dug up the ore and smelted it as if it were iron, were surprised to see what they took for silver, flow from the tap-hole. They endeavoured to dispose of it as such at Ránígan, and there learnt its true nature. They then abandoned the pit, and after a few years the exact locality where it occurred was forgotten. Subsequently a Mr Lord determined to work the ore, and after several trial sinkings succeeded in hitting upon the right spot. The ore occurred in three or four lenticular beds or nests in the gneiss, the cross section being lenticular, and seldom more than a foot or two across, although at one or two points as much as thirteen, while the nests extended over 20 yards

in a direction nearly parallel to the foliation of the gneiss, from the outcrop to the limit of the workings. The gneiss (which is of a thinly foliated, rather rotten variety, including a few thin segregitic seams of a pegmatite) dips at about 25° to E. 10° N., the nests consequently having a similar direction. The ore consisted of gneiss through which crystals and grains of tin were thickly distributed. Mr Deveria, Mr Lord's manager, followed these tin-bearing nests for about 20 yards by an inclined gallery; the tin was then decreasing rapidly in quantity, while the rock was harder, and a large quantity of water draining into the mine. The gross receipts were found to be less than the working expenses, and the mine was abandoned. During the time it was worked, the ore, after being brought to the surface, was broken up while still fresh (as it hardened considerably by exposure) with a common country *dhenki*, or pedal for husking paddy. The pounded ore was then placed in a basket and washed by hand, by which means most of the lighter impurities, chiefly quartz and felspar, were removed. Subsequently after drying, it was sifted in a *sup*, or winnowing basket, to separate the remaining sand. When a sufficient amount of ore had been accumulated, it was smelted with charcoal in the ordinary furnace of an Agariá or iron-worker, the charges being the same as those used in iron smelting. The tin, after being run out and cooled with water, was broken up, the clean metal laid aside preparatory to casting, and the rest, which was much mixed with charcoal, returned to the furnace. The clean t was re-melted in a large open iron vessel and ladled out into mould holding about 40 lbs. of metal each. Altogether only about twelv *maunds* of tin were produced, as I was informed by a native of the place who had worked under Mr Deveria."

Copper.—Extensive copper mines were formerly worked at Bárag gaṇḍá, a village eight miles west of Lorangá, which takes its name from the forty-eight (*bára gandá* or twelve times four) deserted copper mines in its neighbourhood. Dr M'Clelland thus describes the state of the mines in 1849. "The repositories of the ore consist of micaceous quartz, alternating with beds of talcose, actinolite, and hornblende slates; the latter containing a large proportion of scaly mica, and the whole disposed in nearly vertical strata. The ore would appear, from various indications presented by the rubbish extracted from the mines, to be disseminated in a talcose matrix along with detached masses of smoke-blue, granular micaceous quartz of resinous lustre. The old workings consist of open excavations, some

of them in the form of giant steps formed in the face of the mountain, each step being 50 to 100 yards in length and 20 or 30 in breadth. Some of the excavations are mere pits, now filled with water and rubbish. The present inhabitants of the village could afford no information as to the period at which the mines were worked, nor any reason for their having been given up; they suppose the ore to have been exhausted, or transferred by magic to the Dámodar valley. It appears obvious that their abandonment may be ascribed to the imperfect method of working, by which the ore, when extracted in one place, was buried beneath heaps of rubbish in another, until at length the expense would necessarily exceed the returns, even without supposing any diminution to have taken place in the extent and value of the ores. If, on the other hand, the veins or nests of ore alone [illegible] followed by means of galleries, the difficulties alluded to, as [illegible]ly led to the abandonment of these great works, would [illegible]urred. The former value of these mines is proved by hills of [illegible]per slag covering many acres of ground at Girídi, about two miles distant; to which place the ore would appear to have been carried, for the convenience there afforded of wood and water required for washing and smelting. The slag hills at this place are twenty feet high, covered with green sward and trees; and from their antiquity, appear like the natural face of the country." In 1852, Mr Mackenzie, a former servant of the East Indian Railway Company, attempted to reopen the mines; but the venture proved an unprofitable one, though the copper extracted is said to have been of good quality.

MICA is found at several places in *parganá* Kharakdihá. I quote the following account of Dhanwí mine from Dr M'Clelland's Report above referred to. "The mine is situated in *parganá* Kharakdihá, about midway between the base and summit of a mountain 600 feet high, forming the south-eastern extremity of the valley of Dhanwí, near the village of the same name. The glittering effect of the mica in the sun was the chief attraction to the eye on entering the valley, and rendered the concealment of the mine, by the jealous *mahájans*, impossible. The mountain, in which the mine is situated, consists of coarse crystalline gneiss. The strata are inclined at an angle of from 60 to 80 degrees with the horizon, and alternate at short intervals with beds containing flakes of mica, an inch in thickness, and varying in length and breadth from six to twelve inches. These massive plates of mica are loosely agglutinated with large rhomboidal crystals

of felspar, and occasional detached lumps of pseudo-morphic quartz, the latter often containing schorl; the whole being imbedded in a soft soily talcose matrix, from which the mica is easily removed. The excavations are formed at all points within the space of 50 yards in breadth and 300 in length; some being carried perpendicularly down between the strata, and others horizontally, in each case following the direction of the strata. About 50 to 100 men and boys were employed in extracting the mica, and as many more women and children in sorting it and smoothing the rough edges of the flakes, so as to render them portable. In the village were several *mahájans*, some of them superintending the works, others of them acting as agents for the supply of mica; while the numerous bullocks with panniers, and the heaps of packages of mica in bags ready for despatch, gave the place a busy appearance." It [illegible]ed that in 1849, a hundred thousand *maunds* of mica [illegible]d from the Dhanwí mine to Calcutta, where it was sol[illegible]es per *maund*. At the time of Dr M'Clelland's survey th[illegible]was a mica mine at Dhobá (probably Dunbhar), about eight miles north-west from the Dumchánch Pass in *parganá* Kharakdihá; but I can find no detailed information about it. In 1843, nine mica mines were at work in the Government estate of Kodarmá. They were let at a yearly rent of Rs. 12-10-0 for the *bánh*, that is, for the privilege of mining with a gang of ten men only, eight of whom worked at the mine, while two cooked for the party. Only one such gang was allowed to work in each mine, so that the total annual rent amounted to Rs. 113-10-0. It was expected, however, that fresh mines would shortly be opened, in consequence of the enhanced demand for mica in Behar. In 1849 the mica was sold at the mines at Rs. 4 per *maund*.

I quote the following account of the mica mines at Dhábi and Jamtára in *Gádi* Dorandá, *parganá* Kharakdihá, from Mr Mallet's paper above referred to. "The coarsest pegmatite [Mr Mallet uses the term in its German sense to denote a very coarse mixture of quartz, felspar, and silvery mica often containing tourmaline] is frequently found in dykes of moderate thickness, in which, therefore, plates of mica of the largest size occur; and it is such dykes that the miners generally select for their operations. They pay from one to two rupees each per annum, according to the richness of the yield, to the owner of the land for the privilege of mining. The usual mode of working, is simply to excavate a trench along the course of the dyke, which in the Gáwan neighbourhood is seldom carried deeper than 20 or

50 feet. Sometimes, where there is a considerable thickness of decomposed mica near the surface, rude shafts are sunk to the fresh and uninjured mineral, and excavations carried on literally from the bottom. In a few cases, also, rough horizontal galleries are driven in from the side of a hill. In the last methods, of course, artificial light is necessary. No precaution is taken to support the roof, and accidents from its falling in are not unfrequent. The plates of mica are generally brought to the miners' village; and there, after being slightly trimmed with ordinary grass-cutting knives (which are not particularly well adapted for the purpose, but are probably the only ones the people are able to purchase), they are sorted into different heaps according to quality and size. The quality depends on the mineral being in a perfectly unaltered condition, its transparency and freedom from cloudiness caused by internal foreign matter, the absence of minor cleavages, which render it liable to split into ribbons and triangles, and the paleness of its fissile surfaces. Six kinds are recognised, according to the size of the plates, viz.— (1) *sanjhlá*; (2) *manjhlá*; (3) *rási*; (4) *karrá*; (5) *urthá*; (6) *admallá*. Some of the miners intercalate *failurthá* between *urthá* and *admallá*, and speak of another size, *barká*, still larger than *admallá*. All these terms are used rather vaguely, in respect to the absolute size of the plates indicated thereby. At Dhál and Jamtára, I induced the miners to separate a quantity of the mica into the different grades, and measured an average specimen of each, with the following results:—At Dhal—*sanjhlá*, 5 by 4 in.; *manjhlá*, 7 by 5 in.; *rási*, 9 by 6 in.; *karrá*, 12 by 9 in.; and at Jamtára—*sanjhlá*, 4 by 3 in.; *manjhlá*, 5 by 4 in.; *rási*, 6 by 5 in.; *karrá*, 8 by 6 in. The above four sizes include the greater portion of the mica found, it being only in the best mines that *urthá* and *admallá* are procurable. The largest plates I have myself seen measured 19 by 14 in. and 20 by 17 in., but I was informed that considerable larger ones are sometimes obtained. The mica is sold by the load, which is built up of the plates, either into one frustrum of a cone and carried on the head, after being bound together with cord, or into two such, and carried in a *bánghi*. A load equals 6 *panseris*, one *panseri* being equal to 5 *kachchá sers* of 12 *chhatáks* each, or to $3\frac{3}{4}$ *pakká sers* of 16 *chhatáks*; the load, therefore, weighs $22\frac{1}{2}$ *sers pakká*, or 46 lbs. avoirdupois. The miners informed me that the prices paid to them per load by the *mahájans* were as follow:—*sanjhlá*, 3 as.; *manjhlá*, 5 as.; *rási*, 7 as.; *karrá*, 12 as.; *urthá*, Rs. 2 to Rs. 5; *admallá*, Rs 4 to 9; the selling prices being about double the above. The

value of the large plates more especially varies greatly with the quality. I was informed by the Deputy Commissioner that plates of first quality of 18 in. diameter fetch as much as Rs. 60 a *maund* in the market, or about Rs. 30 a load."

ANTIMONY mines were worked by Europeans at the end of the last century, for more than thirteen years, at Sidpur, twelve or fourteen miles from Chatrá; but they were abandoned owing to a disagreement among the partners. Remains of extensive buildings and excavations are still to be seen.

TEA-CULTIVATION.—Before proceeding to a detailed account of the several tea-gardens of Hazáribágh, I notice briefly some conditions of tea-growing which seem to be peculiar to the District. For the sake of contrast, I also show the temperature, mean humidity, and rainfall of Goálpárá in Assam and Silchár in Cachar, side by side with those of Hazáribágh. The figures are taken throughout from the Meteorological Report of Bengal for 1874.

In the first place, while tea requires an equally warm climate throughout the year, the temperature of the Hazáribágh plateau is liable to sudden changes of heat and cold, and displayed an absolute range in 1874 of 69·5°, as compared with 53° and 56·6°, the extreme absolute range of Goálpárá and Silchár respectively. Similarly, while the mean yearly temperature of Hazáribágh is 74·4°, that of Goálpárá 74·9°, and of Silchár 75·7°, the mean range of temperature at Hazáribágh is 25·0°, as against 17·9° at Goálpárá and 18·8° at Silchár. Secondly, the average rainfall of this District is not only much smaller than that of Assam, but is less evenly distributed over the year. Thus, in 1874 rain fell in Hazáribágh District on 134 days during the year, as against 148 days in Goálpárá and 187 days in Silchár. On comparing the mean humidity of the three Districts, it appears that in Hazáribágh the mean humidity is represented by 51, in Goálpárá by 71, and in Silchár by 73. Again, Assam and Cachar, in common with the eastern Districts of the Delta, have a fairly copious rainfall during the earlier months; but Hazáribágh, like the rest of Western Bengal, has from January to May a peculiarly slight fall. The average rainfall of Hazáribágh is 52·40, that of Goálpárá is 96·43, and that of Silchár 118·51. But in the first five months of the year the average rainfall in Hazáribágh is only 3·30, while in those months Goálpárá gets 21·83, and Silchár 36·55 inches. During those five months of the year 1874, rain fell in Hazáribágh on 21 days only, but in Goálpárá it fell on 57 days, and in Silchár on 75. The injurious effect on the tea-plant of this

deficiency of rain during the first five months of the year is aggravated by the prevalence during April and May of hot westerly and north-westerly winds, which prevent the mature plants from "flushing" or throwing out fresh leaves, and also oblige the planter to go to some expense in erecting shelter for his immature plants. Thirdly, although it is true that in some parts of Hazáribágh soils can be found which are not appreciably inferior to those of Assam; yet speaking generally, the soils of this District are shallower, drier, less nourishing, and more easily exhausted than the regular tea soils of the eastern plantations. Lastly, irrigation, which might in some measure counterbalance the disadvantages I have enumerated, can hardly be applied effectually to a garden except at a high cost; and in the hot season, unless applied very thoroughly, is definitely injurious to the plant.

As a set-off against these drawbacks, Hazáribágh is free from the "labour question," which has so seriously affected tea-cultivation in Assam. The supply of labour is here practically unlimited, and the only complaint which the planters have made, is that the coolies are rather apt occasionally to leave the tea-garden in order to work on their own land. It would seem, however, that the remedy for this is simply to settle a colony of labourers close to the garden, so that they will be always at hand. This I understand has in fact been done in the Sítágarhá plantation.

There are three tea-plantations containing mature plants in Hazáribágh—at Sítágarhá, Jhumrá, and Máhudí. The SÍTÁGARHÁ tea-plantation, the property of the "Rámgarh Tea Company," is situated at the base of Chandwára hill, about four miles due east of Hazáribágh. It was started in 1853-54 as a coffee-plantation, under the name of the "Hazáribágh Coffee Company." Owing to the exposed nature of the situation, the coffee-blossom was destroyed by the hot north-west winds, and after a time the attempt to grow coffee was abandoned. In 1861 Mr Max Liebert, the present manager for the Rámgarh Company, commenced the cultivation of tea. The average elevation of the garden is about 2000 feet above sea-level; and the total area of land available is nearly 1350 acres. Of this area 326 acres were in 1872 under mature plants. Up to 1872 only green tea was manufactured; and the approximate yield of that year is estimated at 20,000 lbs., being 67 per cent. Hyson, 14 per cent. Gunpowder, 8 per cent. Imperial, and 11 per cent. Dust. The average yield is returned at 62 lbs. per acre of mature plant. China tea was at first grown, but was superseded by a hybrid variety.

The land is held partly on a twenty years' lease from the Rájá of Rámgarh, with option of renewal, and partly on a *mukarrarí* lease from some of the sub-tenure holders of the *zamíndár*. The labourers employed are Kols imported from Chutiá Nágpur. Almost all of them are Christians, and they have settled on the plantation with their wives and families. Since 1872 a fresh system of pruning the shrubs has been adopted at Sítágarhá, with marked success. The approximate yield of fine tea amounted in 1873 to 30,130 lbs., or an average of 98 lbs. per acre; and in 1874 to 42,391 lbs., or an average yield of as much as 140 lbs. per acre. At the same time, twelve and a half acres of waste land have been cleared, and the total area under mature and immature plants is now 338½ acres.

JHUMRA.—The total area of land included in the Jhumrá tea-plantation is 680 acres, with an average elevation of 2300 feet above sea-level. Of this area 400 acres are rock and jungle, unsuited for planting; 150 acres are under mature plants, and 30 acres under immature, while 100 acres of cultivable land still remain uncleared. The average yield is estimated at 50 lbs. per acre of mature plant. In 1872, the total yield of the estate amounted to 7500 lbs., 7100 of which were made up as black tea and 400 as green. The manager, Mr A. H. Thompson, reports as follows:—"The land, as uncleared hill and jungle, was obtained on lease from the late Rájá of Rámgarh for four twenty-year periods, the annual rent to be doubled at the expiration of each period. At the expiration of this term of eighty years, an annual rent was to be fixed, amounting to one ánná in the rupee more than the annual rent for the fourth period. The soil of Jhumrá is considered to be good for tea, being that generally known as virgin forest soil. The climate is very uncertain, being fair on an ordinary season, but extremely trying for some seasons; for instance, during the present year of 1872, great loss both of plant and crop has been experienced. Manure has been but slightly used, as anything but vegetable mould or green manure is difficult to be obtained; where animal manure has been applied, it has been found to give good results. The plant now at Jhumrá is mostly "hybrid;" when started in 1863, some seed was obtained from Kumáon, which was almost pure China, and some from Dárjíling, which was a good hybrid, and some from Assam, which was indigenous. For the last two years some trees have been allowed to seed; and we have now an excellent plant of the hybrid species, the produce of the garden, with which all vacancies are being filled up, and the China plant is being gradually removed. In no part of the manufacture has any machinery been introduced, as it is

supposed that hand-labour is cheaper and answers best. The coolies on the garden have hitherto come of their own accord for service from the neighbouring villages. The castes represented are Ghatwáls, Kádris, Kurmís, Karmálís, Bhuiyás, and Santáls. On an average 100 men and 50 women are employed; the pay of a man being Rs. 3-4-0 per month, and that of a woman one anna for every day she works. There is great difficulty in obtaining the required daily number, as the population is scarce, and the people are lazy and appear indifferent to employment. Great trouble in the accounts and loss to the work is caused by the numbers that absent themselves for days together to go to their houses, where most of them retain an interest in or work lands. An endeavour is consequently now being made to import some Kols from Chutiá Nágpur, who, it is hoped, will answer better than local labourers. As the coolies are generally in good health, the mortality is small. Upwards of an acre of tea on the garden was burnt down this spring, in consequence of a very extensive jungle-fire which surrounded the plantation, and which originated in the jungle appertaining to the village of Patam Mundá, near the south base of this hill. Such fires are of constant occurrence during the spring, and they also do much harm to the wood of the forest."

MÁHUDÍ TEA-PLANTATION, the property of Messrs Mackinnon, Mackenzie & Co., is situated in the slightly hollowed sandstone plateau which forms the summit of Máhudí hill. The average elevation of the garden is about 2000 feet above sea-level. The land occupied by the plantation is held on a renewable lease from the Rájá of Rámgarh, on precisely the same terms as the last-mentioned plantation. In 1872 the area under mature plant was 150 acres, while 4 acres were used as a nursery for immature plants. The approximate yield of tea in the same year was estimated at 12,000 lbs., of which 3170 lbs. were black tea, and 8830 green; showing an average yield of 80 lbs. of tea for every acre of land under mature plant. As is the case in the other plantations of Hazáribágh District, the labour difficulty is unknown.

PÁRASNÁTH HILL TEA-PLANTATION.—This garden is as yet (1875) in its infancy, and contains no plant that has come to maturity. As, however, it is the most promising site for tea-cultivation that has been opened up in Hazáribágh, and presents the nearest approach to the soil and climate of Assam, the special conditions of the garden are noticed here at length. The total amount of land taken is about fourteen square miles, lying on the north

face of Párasnáth hill, at an elevation of between two and three thousand feet. This is held from the Ghátwál Rájá of Pálganj under a *mukarrarí* lease. During the first thirty years, rent will be paid on the land brought under cultivation at a rate of eight annas per local *bighá* of 32,400 square feet. At the expiration of that period the lease-holder must elect to take finally a specific amount of land, on which he will pay the full rate of seven rupees per *bighá*. A projecting spur of the hill, running north and south, protects the garden from the scorching west winds, which have proved so detrimental to tea in other parts of the District. As far as I am aware, there are no complete returns of the rainfall on Párasnáth; but all observers agree in thinking that, owing to the height of the hill (4569 feet) and its isolated position, it catches a larger amount of rain than falls upon the surrounding plain. In the event of a deficiency in the rainfall, the garden could be irrigated at an almost nominal cost from several small streams passing through it, which contain water throughout the year. The whole north face of the hill is covered with the most luxuriant jungle, which has never been cleared, and has therefore deposited in the course of years a deep layer of fertile vegetable mould. In April 1875 the spot was visited by a well-known expert, for several years a tea-planter in Assam. His report describes the soil as in some places rather clayey, but in most a light sandy loam of a rich yellow colour, reminding him forcibly of the soil in Assam. He also remarked on the depth of the deposit of vegetable mould, especially in some of the undulating basins which lie between the smaller spurs of the hill. As to the amount of land available, he was of opinion that about five hundred acres could be brought under tea-cultivation within a convenient distance from the present site of the nurseries. At the time of his visit, only a few of the young plants had appeared above ground, owing to their having been sown too deep in the first instance; but such plants as he saw, he pronounced to be healthy and vigorous. Labourers, chiefly Santáls, are to be had without difficulty; and the tea-garden itself is distant only twenty-two miles from the railway station of Girídi.

Silk.—The ordinary silkworm (Bombyx moria) is not found in Hazáribágh. Cocoons of the *koá* or tasar-silk insect (Antheræa paphia) abound in most of the jungles of the District, particularly in *parganás* Golá, Dantára, and Kundá, and in Gáwan and Sátgawan, the two northernmost *gadis* or feudal estates of *parganá* Kharakdihá. The cocoons are in the first instance collected in the

jungles. Those which are to be used for breeding are hung up in a shed and watched. When the moths issue from the cocoons, the males fly away, but the females remain settled on their cocoons. At night the males return; and as soon as they are seen to attach themselves to the females for the purpose of impregnation, both insects are enclosed in a basket of *ásan* leaves (Terminalia alata) and put aside. In about a month the worms issue from the eggs, and are then taken to the jungle, hung up on an *ásan* tree until fresh cocoons are formed, and very carefully guarded, day and night, to protect them from crows and ravens, which feed on the worms. Before forming into cocoons, the worms are removed from one tree to another three or four times, as the trees get despoiled of leaves. Parties of from four to nine men join together and protect these worms. They enclose as much of the jungle as is required for feeding the worms, and during this period they live entirely on the spot. The worms feed almost entirely on the *ásan* tree. A few are seen to feed on *sál*, but their cocoons are inferior. Each man engaged in protecting and rearing the *tasar* worms pays to the *zamíndár* from 6 to 8 annas for the privilege. The area over which *tasar* cocoons are gathered in this District is not more than thirty square miles. Where cocoons are regularly collected, the average number of *ásan* trees is five or six per *bighá*; but in some large jungle tracts the tree is found only occasionally.

The rearing of the silkworm is not confined to any particular caste; Bhuiyás, Ghátwáls, Bhogtás, Santáls, Kurmís, Joláhas, and even Goálás, engage in this work. The cocoon gatherers are supported by *baniás* or middle-men when guarding the worms, and are therefore obliged to sell their cocoons to those middle-men at from Rs. 5 to Rs. 6 a *khari*. The system of reckoning used in dealings between middle-men and cocoon-gatherers is as follows:—5 cocoons = 1 *gabi* or *gandá*; 21 *gabis* = 1 *pan*; 16 *pans* or 1680 cocoons = 1 *khari*. The middle-men sell the cocoons to the *mahájans* or dealers at Rs. 8 to Rs. 9 a *khari*, allowing only four cocoons to the *gabi*, or 1334 to the *khari*. In Gáwan, Sátgáwan, Kundá, and Danttára, cocoons are collected three times in the year, viz., in August and September, in November and December, and in May and June. Of these, the second crop is the most productive, and the last one the least. In Srirámpur, Pálganj, and Golá, there is only one gathering, in November and December. Except in *parganá* Golá, the cocoons of the whole District are taken by *mahájans* from Bhágalpur, Gayá, &c. In Hoseir, Sáran, and Pittarbár, in *parganá*

Golá, the *Jaswár baniás* and the *patuás* purchase the cocoons from the rearers at Rs. 5 per 17 *pans*, each *pan* containing 80 cocoons. They reel off the silk, which is done by all castes, and both by men and women; the men get Rs. 3-8-0 a month, and the women from 4 to 6 pice daily. The *baniás* sell the silk to the *mahájans* at Rs. 7-8-0 to Rs. 8-8-0 per *ser* of 88 *tolás*. It is estimated that silk thread to the value of Rs. 100,000 is sold annually in the three marts of *parganá* Golá. The purchasers of this silk are called "Chittarpuri" *mahájans*, and consist of the following castes:—Hindus—Agarwálá, Jaswár, Kándu. Muhammadans—Joláha, Ranki. They come generally from Azímgarh. The demand for silk has lately fallen off, and much of the thread is now sent to Bánkurá and Calcutta.

COMMERCE AND MANUFACTURES.—The Deputy-Commissioner reports that there are no manufactures worthy of mention in Hazáribágh District. No accurate information exists as to the value of the exports and imports at the present day. The trade of the District is concentrated at Chatrá, the great central market at which the country produce of Lohárdagá District and the Tributary Mahals of Chutiá Nágpur is exchanged for English cloth, salt, tobacco, household utensils, &c. For a detailed notice of the Chatrá trade, see pp. 87, 88. Besides Chatrá, there are two smaller markets at Tandawá in *parganá* Karanpurá, and Mirzáganj in *parganá* Kharakdihá. The local trade is carried on by means of weekly village markets, at which the *rayats* attend, and lay in their stocks of necessary articles. In consequence of this system there are very few village shopkeepers. There are only two fairs held in Hazáribágh during the year—at Chatrá, and at Hutru in *parganá* Kundá. Large numbers of cattle and buffaloes are sold on both occasions. The cattle are brought from Palámau, and the buffaloes from Sargújá and Rewá, and the country further west.

The registration returns on the Gayá and Bánkipur Road, during the four months ending December 1875, show that Hazáribágh exported by that route 1571 *máunds* of agricultural produce, 18 loads of timber, and Rs. 215 of native goods; and received 2045 *maunds*, 739 animals (chiefly buffaloes), and Rs. 9163 of manufactures, including Rs. 9120 of European piece goods.

The tables (on pp. 171, 172) showing the exports and imports of Hazáribágh District are taken from Major Thompson's Revenue Survey Report. Of course, the quantities are only approximate; but on the whole, the tables give a fairly correct idea of the general nature of the trade of the District.

Names of Articles.	Estimated Quantity exported.	Where Sent.	Value.
Bamboos,	3,000,000 at 300 per rupee,	Behar,	Rs. 10,000
Cattle,	10,000 bullocks at Rs. 12 per head,	To all the Eastern Districts,	120,000
Clarified butter (*ghi*),	10,000 maunds at Rs. 22 per md.	Calcutta,	220,000
Coal,	30,000 maunds at 4 mds. per rupee,	Railway works on Ganges, in Monghyr District,	7,500
Hemp (*san*) with *sábai* grass,	500 maunds at Rs. 4-8-0 per md.	Bardwán and Ráníganj,	2,250
Hides,	40,000 at Rs. 30 per score,	Calcutta,	60,000
Iron,	50,000 at Rs. 3 per md.	Behar, Sháhábád, and Tirhut,	175,000
Jungle Produce: Dried petals of the *mahuá* tree (bassia latifolia), used as a condiment, and from which a spirit is distilled,	100,000 maunds at 8 as. per md.	Behar, Sháhábád, and Patná,	50,000
Jungle Produce: *Kath*, catechu,	15,000 at Rs. 5-8-0 per md.	Calcutta, Patná, and Mirzápur,	82,500
Jungle Produce: *Dhuná*, a resin produced from the *sakud* or *sál* tree, used in painting wood,	2000 maunds at Rs. 3-12-0 per md.	Half to Calcutta, the other half to Patná,	7,500
Jungle Produce: *Amlá*, a fruit resembling a plum, which the natives pickle. It is also used for dyeing and medicine,	2000 maunds at Rs. 0-8-0 per md.	Do. do.	1,000
Jungle Produce: *Ludh*, the bark of a tree used in dyeing, and in making the red powder for the *Holi* festival,	500 maunds at Rs. 1 per md.	Behar and Patná,	500
Jungle Produce: *Harrá*, fruit used as a dye,	1000 maunds at Rs. 2-8-0 per md.	Half to Calcutta, half to Patná,	2,500
Jungle Produce: *Baherá*, do. do.	1000 maunds at Rs. 5-8-0 per md.	Do. do.	2,500
Jungle Produce: *Báns lochan*, a crystallised substance found inside the bamboo, used as a tonic,	10 maunds at Rs. 20-0-0 per *ser*,	One-third to Calcutta, the rest to Mirzápur,	8,000
Jungle Produce: *Silájit*, a crystallised discharge from a rock, used as a tonic,	1 maund at Rs. 10-0-0 per *ser*,	Do. do.	400
Jungle Produce: Honey,	100 maunds at Rs. 3-0-0 per md.	Half to Bardwán, half to Behar,	300
Jungle Produce: Lac,	24,000 maunds at Rs. 18-0-0 per md.	Two-thirds to Mirzápur, one-third to Ráníganj,	432,000
Metal cooking utensils,	7000 maunds at Rs. 60-0-0 per md.	Two-thirds to Chutiá Nágpur, one-third to Behar,	420,000
Mica,	10,000 maunds at Rs. 3-0-0 per md.	Half to Calcutta, half to Patná,	30,000
Oils, vegetable (with *mahuá*),	10,000 maunds at Rs. 7-0-0 per md.	Calcutta,	70,000
Oil-seeds, *Til*,	15,000 maunds at Rs. 2-2-0 per md.	Bánkurá, Bardwán, and Calcutta,	32,000
Oil-seeds, *Sirgujia*,	20,000 maunds at Rs. 1-8-0 per md.	Do. do. do.	30,000
Oil-seeds, *Sarisha*,	25,000 maunds at Rs. 2-8-0 per md.	Do. do. do.	75,000
Silk, cocoons,	800,000 at Rs. 15 per 1000,	Two-thirds to Bardwán & Calcutta, one-third to Gayá,	12,000
Silk, prepared *tasar*,	120 maunds at Rs. 18 per *ser*,	Mubárakpur, Azimgarh,	86,400
Sugar, raw or (*gur*),	15,000 maunds at Rs. 5 per md.	Two-thirds to Chutiá Nágpur, one-third to Monghyr,	75,000
Timber, *sál*, Railway sleepers,	35,000 at Rs. 2 each,	Ráníganj,	70,000
Timber, *sál*, Logs for planks,	10,000 at Rs. 2 each,	Ráníganj and Behar,	20,000
Timber, *sál*, Beams,	10,000 at Rs. 3 each,	Westwards to the Son river,	30,000
Vetch, *urid*,	10,000 maunds at Rs. 2-8-0 per md.	Bardwán and eastward,	25,000
		Total Rs.	2,15[illegible]

STATEMENT SHOWING THE IMPORTS, FROM WHENCE RECEIVED, AND THEIR VALUE, FOR HAZÁRIBÁGH DISTRICT, 1863.

Names of Articles.	Estimated Quantity Imported.	From whence Received.	Value.
Blankets,	6000 at Rs. 1-8 each,	Behar and Sháhábád,	Rs. 9,000
Cattle,	15,000 bullocks, Rs. 12-0 per head, 5000 buffaloes, Rs. 15-0 per head, 5000 cows, Rs. 10-0 per head,	Cows and bullocks from Palámau and Chutiá Nágpur, buffaloes from Ará and Districts north of the Ganges,	305,000
Clarified butter (*ghi*),	5000 maunds, at Rs. 22-0 per md.	Chutiá Nágpur, Torí, and Palámau,	110,000
Cloth, Europe, cotton or piece goods,	Sufficient to clothe half the population,	Calcutta,	100,000
Cloth, Native, do. do.	Do. do.	Behar,	20,000
Copper,	1500 maunds, at Rs. 80-0 per md.	Patná,	120,000
Cotton, Cleansed,	2500 maunds, at Rs. 13-0 per md.	Mirzápur,	32,000
Cotton, Raw,	4500 maunds, at Rs. 12-0 per md.	Shambalpur, Torí, and Palámau,	54,000
Embroidery,	A small quantity (say) 20 *sers*, at Rs. 150-0 per *ser*,	Benares,	3,000
Imported wines, malt liquors, & stores for the troops & residents,	Wines and spirits, Rs. 99,000-0; malt liquor, Rs. 162,000; stores, Rs. 35,000,	Calcutta,	296,000
Field pea (gram),	23,000 maunds, at Rs. 2-0 per md.	Behar,	50,000
Gold,	A small quantity (say) 20 *sers*, at Rs. 1440-0 per *ser*, or Rs. 18-0 per *tolá*,	Calcutta,	28,800
Hemp,	200 maunds, at Rs. 4-8 per md.	Torí and Chutiá Nágpur,	900
Lead,	3500 maunds, at Rs. 45-0 per md.	Patná,	157,500
Rice,	One-third the quantity consumed, or 500,000 maunds, at Rs. 2-0 per md.	Bardwán, Mánbhúm, and Chutiá Nágpur,	1,000,000
Salt,	100,000 maunds, at Rs. 4-12 per md.	Cattack, *via* Singbhúm and Midnapur,	475,000
Sheep,	10,000, at Rs. 2-0 per head,	North-West Provinces,	20,000
Spices, Black pepper and cloves,	4000 maunds, at Rs. 14-0 per md.	Calcutta,	56,000
Spices, Turmeric, coriander,	6000 maunds, at Rs. 4-8 per md.	Behar,	27,000
Tea seed,	100 maunds, at Rs. 150-0 per md.	Assam, Dárjiling, and Kumáon,	15,000
Tobacco,	20,000 maunds, at Rs. 11-0 per md.	Tirhut,	220,000
Vetch, *Urid*,	20,000 maunds, at Rs. 2-0 per md.	Chutiá Nágpur,	40,000
Vetch, *Rahar*,	5000 maunds, at Rs. 1-8 per md.	Behar,	7,500
Vetch, *Khesári*,	5000 maunds, at Rs. 1-8 per md.	Do.	7,500
Wheat,	80,000 maunds, at Rs. 1-12 per md.	Palámau and Behar,	140,000
		Total, Rs.	3,294,200

CAPITAL is usually employed either in trade or loans, and is not generally hoarded. The rate of interest in small loans, where the borrower pawns some article, such as ornaments or household vessels, varies from 4 as. to 8 as. per rupee, that is, from 25 to 50 per cent. per annum. The terms of the loan are not ordinarily stated in the form of a monthly percentage, but the borrower of R. 1 agrees to repay Rs. 1-4-0, or Rs. 1-8-0, as the case may be, within the year. In large transactions, when a mortgage is given on moveable property, 25 per cent. is usually charged; and when immoveable property is mortgaged, the rate varies from 18 to 20 per cent. In small agricultural dealings, if grain is lent for seed, a return of cent. per cent. is exacted; but if the grain is borrowed for actual consumption, the rate does not exceed 50 per cent. The reason of this difference appears to be that a man who merely requires a loan to sustain himself and his household till harvest time, is really in a better position than a man who has expended his seed-grain, and has no means of raising a crop at all. In all these small transactions, whether the loan is of grain or cash, the usual practice is to take the personal security of the borrower and another *rayat*, in preference to a lien on the crop which entails registration of the deed. The Deputy-Commissioner states that money invested in an estate should yield a return of 6 per cent.

INCOME OF THE DISTRICT.—The net amount of income-tax actually realised in Hazáribágh District in 1870–71 amounted to £9861, 14s. In the following year, 1871–72, when the rate of the tax was reduced to $1\frac{1}{24}$ per cent., and the minimum of incomes liable to assessment raised to £75 per annum, the net amount of income-tax realised was £2593, 14s.

REVENUE AND EXPENDITURE, 1835, 1850, AND 1870.—The following statements will illustrate the growth of the revenue and expenditure since the formation of the present District of Hazáribágh. It has already been remarked that previously to 1835 Hazáribágh, together with Chutiá Nágpur, Palámau and Pánchet, constituted the District of Rámgarh; and no separate returns are available before that date. The revenue rose from £8621, 18s. in 1835, to £10,941, 10s. in 1850; and subsequently increased to £32,841, 6s. in 1870. It should be observed, however, that in this last year £9861, 14s. was derived from the Income Tax, which has since been discontinued. The civil expenditure, on the other hand, has risen, according to the District mode of book-keeping, from £3654, 4s. in 1835, to £7034, 2s. in 1850, and £31,367, 9s. in 1870.

BALANCE-SHEET OF HAZÁRIBÁGH DISTRICT FOR THE YEARS 1835-36 AND 1850-51.

REVENUE.

	1835-36.			1850-51.		
	£	s.	d.	£	s.	d.
1. Land revenue,	4,871	16	3	5,564	2	4
2. *Sayer* and *Abkári* revenues,	2,347	1	10	3,748	10	5
3. Law and justice,	98	4	3	180	2	10
4. Stamps,	1,304	16	1	1,213	3	5
5. Post-office,	...			235	11	5
Total,	8,621	18	5	10,941	10	5

EXPENDITURE.

	1835-36.			1850-51.		
	£	s.	d.	£	s.	d.
1. Administrative charges general,	3,421	7	6	3,973	0	0
2. Civil and criminal contingent expenses,	110	3	0	1,212	6	5
3. Salt officer,	20	16	0	...		
4. Diet of excise prisoners,	56	17	9	...		
5. Revenue contingent expenses,	15	16	2	57	11	1
6. Civil pension,	12	0	0	...		
7. Stamp refund and discount,	17	4	0	...		
8. Refund of fines,	...			8	0	11
9. Salary of additional Principal Sadr Amín,	...			520	4	3
10. Diet of prisoners, &c.,	...			1,195	14	8
11. Commission to treasurer and *poddar*,	...			28	13	0
12. Office rent,	...			5	0	0
13. Rent of cantonment lands,	...			33	11	10
Total,	3,654	4	5	7,034	2	2

BALANCE-SHEET OF HAZÁRIBÁGH DISTRICT FOR THE YEAR 1870-71.

REVENUE.

	£	s.	d.
1. Land revenue,	11,022	0	0
2. Excise revenue,	4,877	0	9
3. Stamp revenue,	3,977	10	0
4. Law and justice,	1,911	12	0
5. Postal receipts,	464	5	6
6. Income-tax,	9,861	14	0
7. Education,	566	7	2
8. Telegraph receipts,	77	4	0
9. Miscellaneous receipts,	83	12	10
Total,	32,841	6	3

EXPENDITURE.

	£	s.	d.
1. Revenue department,	6,594	7	0
2. Judicial department,	2,637	5	0
3. Police department,	8,279	0	0
4. Jail department,	6,601	11	3
5. Ecclesiastical department,	838	4	0
6. Medical department,	1,107	16	6
7. Education department,	566	7	2
8. Postal department	3,572	9	10
9. Telegraph department,	814	14	2
10. Discount on the sale of stamps,	102	10	4
11. Service pension,	100	10	0
12. Refund and drawback,	152	14	0
Total,	31,367	9	3

The Deputy Commissioner was requested to deduct deposits and matters of account, in furnishing the balance-sheet for the year; but I have found it necessary to correct several items in the Budget estimate from the actual results of the year as subsequently ascertained. Thus, on the revenue side, I have given the amount actually realised under items Nos. 5, 6, and 7. On the expenditure side, I have given the actual outlay as reported by the Inspectors-General of Police and of Jails, and the Director of Public Instruction, under Nos. 3, 4, 7, and 8. Subject, therefore, to the above remarks, the revenue of 1870-71 would be £32,841, 6s. 3d.; the expenditure, £31,367, 9s. 3d.

Land Revenue.—The land-tax is by far the most important item of revenue in Hazáribágh, and in 1870–71 formed 34 per cent. of the total revenue of the District. In 1835, there were eighty-six separate estates on the rent-roll of the District, held by 129 registered proprietors or coparceners, paying revenue direct to Government. The total land revenue in that year amounted to £4871, 16s. 4d. This sum would show an average land revenue paid by each estate of £56, 13s., and of £37, 15s. 4d. from each individual proprietor or coparcener. In 1850, the number of estates had increased to 140, and the registered proprietors to 214. The land revenue demand amounted to £5564, 2s. 5d., or an average payment of £39, 14s. 11d. from each estate, and of £26 from each individual proprietor or coparcener. In 1870–71, the number of estates had increased to 244, the registered number of proprietors being 427. The total land revenue amounted to £11,022, equal to a payment of £45, 3s. 5d. from each estate, or £25, 16s. 3d. by each proprietor.

From the earliest times of which we have any knowledge, the succession to landed estates in the tract of country now known as Hazáribágh District has followed the rules of primogeniture. The eldest son takes the entire estate, and provides for the other members of the family by assigning them smaller holdings as maintenance grants. This custom was legally recognised by Regulation X. of 1800, and the Bengal law of partition (*batwárá*) has never been in force in the District. The increase in the number of estates on the rent-roll noted above is due, therefore, to other causes than the subdivision of property. Thus, between 1835 and 1850, a large number of villages in *parganá* Kharakdihá were resumed under the provisions of Regulation II. of 1819, each group of villages separately settled being entered on the rent-roll as a distinct estate; and again, between 1850 and 1870, the *mauzádárí* or detailed village settlement of the confiscated *mahal* of Kodarmá nearly doubled the number of estates on the roll.

Another peculiar feature of the revenue administration of the District is the exemption of estates from the ordinary process of sale for arrears of revenue. The operation of Regulations XIV. of 1793 and V. of 1812 was suspended for Hazáribágh by Section II. Regulation XIII. of 1833; and under Section V. of the same Regulation, the Governor-General's Agent for the South-West Frontier instituted what is known as the *dastak* system of levying arrears. When an estate falls into arrear, the Deputy-Commissioner demands pay

ment by a written document (*dastak*), specifying the amount of the arrear, with the date on which it fell due, and calling for immediate payment. If the sum is not paid within a reasonable time, the immovable property of the defaulter is attached, and may be sold by auction after fifteen days, if payment be still withheld. I have already noticed in the paragraphs on the early history of Hazáribágh (p. 21), that sales in execution of decrees for money are not permitted, unless the estate is so deeply involved that it is impossible to save it from sale, by attachment and management on behalf of Government.

Protection to Person and Property.—In 1850 there were five Magisterial and seven Civil and Revenue Courts in Hazáribágh. In 1860, the number was reduced to four Magisterial and seven Civil and Revenue Courts; and again increased in 1870 to ten of the former and nine of the latter. The number of covenanted officers at work in the District throughout the year was one in 1850, one in 1860, and three in 1870. Until the year 1859, the chief administrative officer of the District was styled the Principal Assistant to the Governor-General's Agent. In 1861, his title was changed to that of Deputy-Commissioner. He is vested with the usual powers of a Magistrate-Collector of a District; and he may also be specially empowered to try all offences not punishable with death, and to pass sentence of imprisonment for a term not exceeding seven years, subject to the condition that any sentence of upwards of three years imprisonment passed by him must be confirmed by the Judicial Commissioner to whom he is subordinate. On the Civil side, he has also the powers of a Subordinate Judge. His court is therefore enumerated twice over in the statement of Courts given above, being both a Magisterial and a Civil Court.

Rent Law.—The number of rent cases instituted under Act X. of 1859—the Rent Law of Bengal—is returned by the Deputy-Commissioner as follows:—In 1861–62, 119 original suits, with 215 miscellaneous applications; in 1862–63, 159 original suits, and 259 miscellaneous applications; in 1866–67, 334 original suits, and 220 miscellaneous applications; and in 1868–69, 632 original suits, and 376 miscellaneous applications. It will thus be seen that, although the number of land suits is trifling for the large area of the District, there has been a considerable increase of late years.

Police Statistics.—For police purposes, the District of Hazáribágh is divided into thirteen Police Circles (*thánás*):—viz., (1)

Hazáribágh, (2) Gumiá, (3) Kashmár, (4) Rámgarh, (5) Tandawá, (6) Chatrá, (7) Hunterganj, (8) Barhí, (9) Kodarmá, and (10) Bagodar, in the Sadr Subdivision; (11) Pachambá, (12) Kharakdihá, and (13) Gáwan, in the Pachambá Subdivision. The machinery for protecting person and property consists of the Regular or District Police, the Village Watch or rural force, and a Municipal Police.

Regular Police.—In 1872 the strength of the Regular Police was as follows. The figures are taken from the Bengal Police Report for 1872:—2 superior European officers, consisting of a District Superintendent of Police and an Assistant Superintendent, receiving a total salary of Rs. 1100 a month, or £1320 per annum; 4 subordinate officers, on a salary of upwards of Rs. 100 a month, or £120 a year, and 88 officers on less than Rs. 100 a month, or £120 a year,—maintained at a total cost of Rs. 2770 a month, or £3324 a year, or an average pay of Rs. 30-1-9 a month, or £36, 2s. 7d. a year for each subordinate officer; 16 mounted, and 447 foot constables, maintained at a total cost of Rs. 2902 a month, or £3482, 8s. a year, or an average pay of Rs. 7 a month, or £8, 8s. a year, for each mounted constable, and Rs. 6-3 a month, or £7, 8s. 6d. for each foot constable. The other expenses connected with the Regular Police in 1872 were: a sum of Rs. 150 per month, or £180 per annum, allowed for travelling charges of the superior officers; Rs. 172-13-4 a month, or £207, 8s. a year for pay and travelling allowances of their office establishments; Rs. 288 a month, or £345, 12s. a year for horse allowance; and Rs. 822-2-8 a month, or £986, 12s. a year for contingencies and all other expenses; bringing up the total cost of the Regular Police of Hazáribágh, which contained a total strength of 557 officers and men, to Rs. 8205 a month, or £9846 a year. The Census of 1872 returns the area of the District at 7021 square miles, and the population at 771,875. According to these figures, the total strength of the Regular Police force is one man to every 12·60 square miles of the District area, or one man to every 1385 of the population. The cost of maintenance is equal to £1, 8s. 0½d. per square mile of area, or 3d. per head of the population.

The Municipal Police maintained in the towns and large villages consisted in 1872 of 4 officers and 61 men, maintained at a total cost of Rs. 332-5-4 a month, or £398, 16s. a year, defrayed by means of rates levied from the householders and shopkeepers carrying on business within municipal limits. The three following towns,

Hazáribágh, Ichák, and Chatrá, which have been constituted municipalities, contain a total population of 28,867 souls. This figure gives 3d. as the average cost of the municipal police per head of the town population.

THE RURAL POLICE, or *chaukídárs*, for the watch and ward of the villages in the interior of the District, consisted in 1872 of 3834 men, maintained by contributions from the villagers and rent-free grants of land, at an estimated total cost, including both sources, of Rs. 4599 a month, or £5518, 16s. a year, or an average pay in money or lands of Rs. 1-3 a month, or £1, 8s. 9d. a year for each man. Each village watchman has, on an average, 47 houses under his charge. According to the area and population given above, there is one village watchman to every 1·83 square miles, or one to evely 201 of the population; maintained at a cost of 15s. 8½d. per square mile, or nearly 2d. per head of the population.

Including, therefore, the Regular Police, the Municipal Police, and the Village Watch, the machinery for protecting person and property in the District of Hazáribágh, consisted in 1872 of a total force of 4456 officers and men, equal to an average of one man to every 1·57 square miles, as compared with the area, or one man to every 173 souls, as compared with the population. The aggregate cost of this force in 1872 was Rs. 13,136-5-4 a month, or £15,763, 12s. a year, equal to a charge of £2, 4s. 10d. per square mile, or a little more than 4¾d. per head of the population.

CRIMINAL STATISTICS.—During the year 1872, the police conducted 1540 "cognisable" cases, the percentage of final convictions to men brought to trial being 66·90 per cent.; and 430 "non-cognisable" cases, the proportion of final convictions to prisoners brought to trial being 40·10 per cent. The total number of both cognisable and non-cognisable cases in 1872 was 1970, the percentage of final convictions to prisoners brought to trial for both classes of crime being 57·51 per cent.

In 1870, 5 cases of murder occurred in Hazáribágh, in only 1 of which was a conviction obtained; in 1871, out of 7 cases, conviction followed in 3. One of these murders was committed by a gang of Karmálís, iron-forgers living in hamlets surrounded by forests, who are notoriously bad characters. A second case occurred in a travellers' rest-house on the Grand Trunk Road; and in a third case the victim was in bad repute as a sorcerer, and was killed on his return from a sacred grove where he had been sacrificing a pig to pro-

pitiate an evil spirit. All three crimes are characteristic of Hazáribágh District. The offence of gang-robbery showed a decrease from 20 cases in 1870 to 15 cases in 1871. In the annual Crime Report of the Chutiá Nágpur Division for 1870, Colonel Dalton remarked, with reference to Hazáribágh, that only three *dákáitís* on houses had been reported. The remaining seventeen were upon travellers, as they passed through hilly and wooded parts of the District, who often persisted in making short cuts instead of using the ordinary protected highways. In two of the gang-robberies in 1870, some rural road-watchmen followed and fought the *dákáits*, losing a man in one case, and in another having one of their number severely wounded. Of the gang-robberies committed in 1871, all but four were of a petty description. Thirteen of the cases occurred in jungles, and the value of the property stolen amounted to Rs. 787. A conviction was obtained in only one case, but detection is admitted to be peculiarly difficult in a large and sparsely populated District like Hazáribágh. Eighteen cases of robbery occurred during 1870, one of which was the most serious case of the year in the Lower Provinces, Rs. 3451 being plundered. The police, however, recovered Rs. 3351. In 1871, the number of robberies decreased from 18 to 4. The offence of housebreaking shows an enormous increase from 55 cases in 1870 to 230 cases in 1871. Colonel Dalton thinks this is due to some defect in the previous returns; and the Deputy-Commissioner of Hazáribágh writes on the subject:—"The police seem utterly unable to deal with this crime, very few offenders being traced; and I believe that until we can reform the village police, and make the post of village policeman such that men of higher stamp will take it, this species of crime will not cease. The present *chaukídárs* are either paid by, or in league with, the housebreakers." I have already remarked in the paragraph on Village Officials, that the watchmen of Hazáribágh are taken from the worst classes of the population.

On the prevalence of serious crime in the District Colonel Dalton wrote in 1872:—"Hazáribágh was always notorious for its *dákáitís*. Formerly, in the Mughul days, the Kharakdihá jurisdiction was the worst part of the District for this crime; afterwards the Grand Trunk Road attracted attention, but a strong road police was established, and great efforts made, not always with success, to render it safe for travellers. Yet I have before me police reports which show that in 1852 eighty-seven *dákáitís*, and in 1853 fifty-eight, were

reported in Hazáribágh District. The transfer of traffic to the railway reduced the attraction; and though the police were also reduced, the road is still fairly patrolled, and the few *sawárs* allowed are of great value. I believe that *sawárs* and rural police are the best defences for roads." *Dákáití* and highway robbery are no doubt rendered particularly easy of commission by the loneliness of the roads, many of which run through dense jungle. Cattle-poisoning is also common, as might be expected in a great grazing District. The poison is administered in two ways—either by wrapping it up in an envelope of *sál* leaves and forcing it down the cow's throat; or by wounding the animal on some part of the body which it can reach with its mouth, and then smearing the arsenic in such a way that in licking the wound enough poison will be taken to cause death. In either case death follows after an hour or two, and the poisoner returns to the spot in time to skin the animal.

In 1872, the crime of gang-robbery showed an increase to 22 from 15 cases in the preceding year. Convictions were obtained in only 2 cases, both of which were on the highway. Five *dákáitís* occurred on the direct road between Ránchí in Lohárdagá District and Sherghátí in the District of Gayá. This is a hilly road bordered in places by jungle, and much used by the pleaders and subordinate officials of the Ránchí Courts. It is stated by the police and local authorities that the *dákáits* were all, or almost all, from Gayá District. In one of the cases they left shoes behind them, which were found to be of Behar manufacture. It appears that some of these men had been seen by a *chaukídár* and others, and that they gave themselves out to be pilgrims who had been to sacrifice kids at Kuleshwari Pahár, and were dressed accordingly. The *chaukídár* wished to detain them till he had reported their arrival to the sub-inspector, but they would not stay. The police were unsuccessful in all five cases. On 29th February and 2d of March 1872, *dákáitís* were committed on pilgrims going to, and returning from, Párasnáth; and a considerable amount of plunder was taken by a gang of *dákáits* under the leadership of one Nara Rái. Two gangs under the same leadership committed two *dákáitís* in the Barákhar river; Nara Rái was recognised with one band, his brother with the other. Again, in August a *dákáití* was committed on a house in the Pachambá police jurisdiction by Nara Rái and his band. The Deputy-Commissioner gives the following account of this notorious *dákáit* and his capture:—"This man has on two occasions been convicted at the

Sessions, and in each instance acquitted by the High Court. The consequence has been that the ignorant inhabitants of that part of the District in which this man resides, in the Karharbárí collieries, believed that he was under the protection of the High Court, and that to assist in arresting him was merely to bring down upon themselves revenge when he was again released. A large reward was offered for his capture; but although information was given on frequent occasions, the man was so well backed up that, though frequently sighted, he could not be seized. At last, acting on a suggestion of the Commissioner, I directed the Superintendent of Police to proceed to Karharbárí; and I sent orders to the *tikáits* of Srirámpur, Karharbárí, Pálganj, and all the *ilákadárs* in the vicinity, to turn out, each with a large body of retainers, with instructions that the whole force should be employed in hunting this man till his capture. The day succeeding the commencement of the hunt, a woman came and gave notice to the Assistant Commissioner of Pachambá, that she had lured Nara Rái into her hut. He determined to go with the woman accompanied by only one native, and was thus enabled to get close to the hut and to capture the man single-handed. The woman received the whole reward. I may add that, only a few days previous to his capture, Nara Rái stopped the engineer in charge of the collieries, who was going to his work seated on a trolly, and begged him to stop the hunt after him till he had an opportunity of petitioning the High Court. Mr Kilby, in his report, suggests the use of mounted police on the roads leading from Sherghátí to Ránchí. There has not been so much *dákáití* in the Pachambá and Bagodar police jurisdiction since Nara Rái's capture, but it is improbable that the gang is broken up." I have quoted at length the details of the capture of this famous *dákáit*, to show what prestige a successful robber may obtain among an ignorant population.

In 1872, there was a large increase in burglary and theft cases throughout the Chutiá Nágpur Division. On this the Commissioner remarks: "The only reason I can give for this rapid increase in crimes against property committed without violence, during the last twenty years, is that it is, in some proportion, owing to the increase in the price of the necessaries of life; and a man who depends on thieving must steal twice as much as he did before, to support himself. The thieves are of various races and castes; but the low helot tribes, who have no cultivation of their own, and live at all

times precariously, are most addicted to thieving, and it is amongst this class that re-convictions are most common."

LOCAL SYSTEM OF POLICE.—In 1837, three years after the establishment of the South-West Frontier Agency, the chief executive officer at Hazáribágh reported on the Police Administration of the District, in answer to a circular letter of the Nizámat Adálat or Chief Criminal Court. The District was then divided into twelve *thánás* or police circles, giving an average area of 585 square miles to each *thánd*. In four of these circles the police were appointed and paid by Government, and were stated to be effective. In one circle, that of Hazáribágh itself, the expense of maintaining the police was divided between Government and the Rájá of Rámgarh; and in the remaining seven *thánás* the police force was kept up by the landholders. The maximum establishment at any of these latter *thánás* consisted of one inspector (*dárogá*), one clerk (*muharrir*), and five constables (*barkandáz*). Then, as now, the characteristic crimes of Hazáribágh District were road *dákáitís* and highway robberies, which the landholders connived at, and the *ghátwáls* or guardians of the passes took active part in. In 1838, a *ghátwál* was killed while engaged in a gang-robbery at Chai; and two years later, the estate of Kodarmá in Kharakdihá was attached and subsequently forfeited, because the owner had been concerned in a serious *dákáití*. The preventive measures adopted then were the same as those which have recently been found sufficient to hold this form of crime in check. Most of the criminals appear to have been natives of Hazáribágh. Occasional inroads were made by bands of Rájwárs from Behar; but these men are said to have been easily recognised by their appearance, and to have been hunted down by the inhabitants of the District. In 1839, a patrol of road-watchmen (*digwárs*) was posted on the newly constructed Grand Trunk Road; but owing to the low pay of the men, and the continual necessity they were under of leaving their posts to bring food from their homes, the arrangement was practically useless. In 1841, a patrol of mounted constables (*sawárs*) was established on the Grand Trunk Road, and on the pilgrim road from Gayá to Deoghar; and the arrangement appears to have had a good effect. In the following year, the chief executive officer proposed to increase the pay of the *digwárs* and *ghátwáls*, and to employ them systematically to guard the roads, without separating them altogether from the landholders' authority. This scheme apparently was not carried out, for

in 1855, Mr Ricketts, in reporting on Hazáribágh, said:—"Were the *digwárs* and *chaukídárs* really paid, in such a manner that they could devote their time to their calling, instead of having to seek their livelihood by other means, the remuneration, whether in land or money, being quite inadequate to their support, they would in numbers suffice for an efficient police; but the allowance is in almost every case totally inadequate, and instead of looking after the *rayats*, the *chaukídár* is obliged to look after himself." Within the last two years the system of patrolling the roads by mounted police and road-watchmen (*aigwárs*), has been re-organised with marked success.

Jail Statistics.—In 1870, there were five jails in Hazáribágh, viz., the Central and District jails, the European Penitentiary at the Civil Station, and the Subdivisional lock-ups at Barhí and Pachamba. The following figures are compiled from the Administration Report of the Inspector-General of Jails for 1870, and from a return specially prepared in the Inspector-General's office, showing the jail population of the District, cost of maintenance, value of jail labour, &c., for the years 1857-58, 1860-61, and 1870-71. There is an element of error in the figures for the earlier years. It has been found that in many cases prisoners have been counted twice and three times over; those transferred to the Central jail from the lock-ups being returned, in both statements, without any allowance made for the transfer. Under-trial prisoners subsequently convicted also appear twice, viz., both as under-trial prisoners and as convicted prisoners. Since 1870 an improved mode of preparing the returns has been adopted; and the figures returned for that year may be looked upon as absolutely correct.

In 1857-58, the first year for which materials are available, the daily average number of criminal, under-trial, and civil prisoners in the Hazáribágh jail amounted to 329; the total admissions of the year being 1241. The discharges were as follow:—Transferred, 150; released, 554; escaped, 268; died, 60; executed, 19: total from all causes, 1051. In 1860-61, the jail returns show a daily average prison population of 537; the total number of prisoners admitted during the year being 800. The discharges were:—Transferred, 120; released, 459; escaped, 9; died, 80: total, 668. In 1870, the daily average number of prisoners in the Central jail amounted to 714; number admitted during the year, direct 7, and by transfer 200, total, 207; the total number dis-

charged from all causes being,—transferred, 3; released, 281; escaped, 9; died, 18: total, 311. The District jail in 1870 contained a daily average of 313 prisoners; number admitted during the year, direct 684, by transfer 103, total 787; and the total number discharged during the year was as follows:—Transferred, 58; released, 617; escaped, 8; died, 12: total from all causes, 695. In the European Penitentiary the daily average number of prisoners during the year 1870 was 39; the number of admissions being,—direct 6, and by transfer 8, total, 14. The discharges were:—Transferred, 10; released, 18; escaped, 2; died, 1: total, 31. For all the jails, the daily average number of prisoners in 1870 was 1066; number of admissions during the year, direct 697, and by transfer 311, total, 1008. The discharges were:—Transferred, 71; released, 916; escaped, 19; died, 31: total, 1037.

The sanitary condition of the Hazáribágh jail has much improved of late years. In 1857–58, the percentage of admissions into the jail hospital amounted to 133·96, and the deaths to no less than 60 or 18·23 per cent. of the average jail population. In 1860–61, although the percentage of prisoners admitted into hospital had increased to 252·33 per cent., the deaths were only 80 or 14·89 per cent. of the mean jail population. In 1870, the percentage of admissions into the Central jail hospital amounted to 111·76 per cent., and the deaths to 18 or 2·52 per cent. of the average jail population; in the District jail, the average of prisoners admitted into hospital was 112·14 per cent., and the deaths were 12 or 3·83 per cent. of the mean jail population; while in the European Penitentiary, the percentage of admissions into hospital amounted to 110·25 per cent., and the deaths to 2·56 per cent. of the mean jail population. The total percentage of admissions in 1870 into all the Hazáribágh jail hospitals amounted to 111·38 per cent., and the deaths to 31 or 2·97 per cent. of the mean jail population.

Cost of Jail Maintenance.—The average cost of maintenance per prisoner in the Hazáribágh jails and lock-ups, including rations, establishment, hospital charges, clothing, contingencies, and all other charges except the cost of the prison police guard, is returned as follows:—In 1857–58, £3, 18s. 5d.; in 1860–61, £4, 6s. 5d.; in 1870, in the Central jail, it was £5, 7s. per head; in the District jail, £4, 13s. 6d., and in the European Penitentiary, £37, 16s. 11d.; total average, £15, 19s. 2d. per head in all the jails of the District. The cost of the jail police guard in 1870 amounted to an

average of 18s. 10d. per head in the Central jail, 18s. 0½d. per head in the District jail, and £9, 4s. 11d. per head in the European Penitentiary; total average, £3, 13s. 11d. per head, making a gross cost to Government of £19, 13s. 1d. per head. Materials are not available for showing the separate cost of the jail police guard in years previous to 1870. The Inspector-General, in his Report for 1870, returns the total cost of the Hazáribágh native jails, European Penitentiary, and Subdivisional lock-ups, including police guard, at £7916, 11s. 3d. Excluding cost of police guard, which is included in the general police budget of the District, the cost of the jails amounted to £6601, 11s. 3d.

Jail Manufactures have been carried on at Hazáribágh since 1844, but only a small proportion of the expense of maintaining the criminal population is returned to the Government in the shape of profits therefrom. In 1857–58, the total value of prison manufactures was £118, 14s. 9d., and the total charges were £75, 5s. 11d., leaving a profit of £43, 8s. 10d.; average earnings of each prisoner employed on manufactures, 16s. 1d. In 1860–61, the value of prison manufactures increased to £332, 8s. 3d., the total charges being £200, 15s. 2d., leaving a profit of £131, 13s. 1d.; average earnings of each prisoner employed in manufactures, £1, 5s. 4d. In 1870, the financial results of the prison manufactures in the Hazáribágh Central jail were as follow:—Credits: value of articles sold during the year, £113, 3s. 3d. No debits are returned; and therefore, assuming the whole of the credits to be net profits, the average earnings of each prisoner engaged in manufactures were £6, 5s. 9d. The District jail in 1870 showed the following results:—Total credits: value of articles sold during the year, £497, 9s. 6d. Debits: value of manufactured goods in store at the close of 1869, £2, 11s. 4d.; raw materials, plant, and machinery purchased, and all other charges incurred during 1870, £292, 10s. 2d.; total debits, £295, 1s. 6d. Excess of credits over debits, or net profit, £202, 8s.; average earnings of each prisoner employed in manufactures, £1, 8s. 4d. The results of the manufactures carried on at the European Penitentiary during 1870 were as follow:—Credits: value of articles sold during the year, £426, 12s. 3d.; value of manufactured articles remaining in store at the close of 1870, £28, 13s. 1d.; value of raw materials in store at the close of 1870, £19, 1s. 10d.; value of plant and machinery in store at the end of 1870, £44, 13s. 1d.: total credits, £519, 0s. 3d. Debits: value

of manufactured goods in store at the close of 1869, £33, 10s. 6d.; value of raw materials in store at the close of 1869, £44, 5s. 11d.; raw materials, plant, and machinery purchased, and all other charges incurred during 1870, £394, 5s. 4d.; total debits, £472, 1s. 9d. Excess of credits over debits, or net profit, £46, 18s. 6d.; average earnings of each prisoner engaged in manufactures, £7, 16s. 5d. The average number of prisoners employed on prison manufactures in the Hazáribágh jails in 1870 was 167, employed as follows:—Gardening, 70; manufacturing cloth, 2·70; bamboo, rattan, and reed work, 2·90; oil pressing, 9; flour grinding, 10; cultivating, 48; miscellaneous, 24·40: total, 167.

EDUCATION IN HAZÁRIBÁGH DISTRICT has hitherto made but little way against the utter indifference of all classes of society. Until 1865 there was no Government school at all, and the annexed table shows how little progress had been up to 1871:—

RETURN OF GOVERNMENT AND AIDED SCHOOLS IN HAZÁRIBÁGH DISTRICT IN 1870–71.

Classification of Schools.	Number of Schools.	Number of Pupils.			Expenditure.			Average cost to Government of each Pupil.	Average total cost of each Pupil.
		Hindus.	Muhammadans.	Total.	Government Grant.	Fees, Fines, and Subscriptions.	Total.		
					£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.
Government English Schools,	1	57	3	60	247 4 0	70 9 5	317 13 5	4 2 5	5 5 11
Government Vernacular Schools,	4	137	51	188	87 6 4	17 7 5	104 13 9	0 9 3	0 11 2
Aided English Schools,	3	150	5	155	57 12 0	86 8 0	144 0 0	0 7 5	0 18 7
Total,	8	344	59	403	392 2 4	174 4 10	566 7 2	0 19 6	1 8 1

At the end of March 1873, the number of persons receiving education even of the lowest description amounted to only ·30 per cent. of the population. In 1872, the Inspector wrote as follows:—"The schools are few and in a poor state, and the people do not care to have them more in number, or better in condition. In towns the *baniás* care only for arithmetic and caligraphy; reading such as they want will come of its own accord, they think, with progress in writing. In the country the villages are scattered, and it is rarely that two villages will send boys to one school. Again, the houses of the *zamíndárs* are unfortunately in the smaller villages; and if the *zamíndár* starts

a little school to oblige the authorities, only five or six boys attend it. In the large villages no one likes to take the lead in a new matter, whether good or bad. The *páthsálá* system is the only one that can be pushed, and even then the absence of teachers will prevent any great extension. The opening of schools without competent teachers will result in failure." The causes of this indifference are not far to seek. Most of the clerkships under Government are filled up by foreigners, so that a knowledge of English is not the obvious road to lucrative employment that it is in Bengal. Besides, even the more intelligent natives of the District are deterred by a sort of blind conservatism from giving their children any better education, either English or vernacular, than they had themselves. One of the richest and most influential *mahájans* in Hazáribágh, on my asking him why he did not send his sons to schools, replied that he had done very well in the world without much learning (he could just sign his name), and he did not see why his sons should want to know any more than he did. In spite of these discouragements, there are signs of improvement even in English education. In 1871-72, only four candidates from the District school appeared at the entrance examination. Three failed, and one passed in the second grade, obtaining a scholarship tenable for two years at Patná. In 1872-73 ten candidates were sent up. All of them passed, and the seven junior scholarships allotted to the Chutiá Nágpur Division were all taken by boys of this school. Concerning the social position of the pupils, the Inspector remarks—"In the higher English schools the middle ranks predominate, the numbers being 48 to 29; but in the middle English schools there are 122 of the middle rank to 139 of the lower. Hence, for those learning English there are 170 of the middle class to 157 of the lower. As the standard of education declines, and with it the fees, the number of the lower orders of society increases. This is only natural, but I was surprised to see so large a proportion of the lower classes learning English. Of those learning English, the three lines of Government services, estates, and professions, had sent almost equal numbers of pupils."

Primary Education is hindered by similar causes to those referred to above. Parents do not see the advantages of education, and the boys' services are required for field-work. Moreover, until quite recently the indigenous village schools (*páthsálás*) received

[*Sentence continued on page* 190.]

COMPARATIVE STATEMENT, showing the Progress of Education in Hazáribágh District for the Two Years 1871–72 and 1872–73.

Classification of Schools.	Number of Schools.		Number of Pupils.		Receipts.								Expenditure.	
					From Government.		From Local Funds.				Total.			
							Fees and Fines.		Other Local Sources.					
	1871–72.	1872–73.	1871–72.	1872–73.	1871–72.	1872–73.	1871–72.	1872–73.	1871–72.	1872–73.	1871–72.	1872–73.	1871–72.	1872–73.
					£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.
Higher Class Government School,	1	1	66	69	209 2 0	195 11 11	70 14 4	81 19 6	...	...	279 16 5	277 11 5	279 16 0	277 11 5
Middle Schools.														
Government Vernacular,	4	4	202	203	109 13 11	109 0 3	23 4 6	25 3 0	...	9 0 0	132 18 5	143 3 3	132 18 5	143 3 3
Aided English,	3	4	159	170	59 10 0	52 8 0	24 19 9	17 11 8	99 0 8	148 19 4	183 10 5	218 19 0	175 19 1	216 18 11
Unaided English,	2	1	102	87	...	...	12 0 2	...	134 7 4	...	146 7 0	...	135 3 4	...
Total,	9	9	463	460	169 3 11	161 8 3	60 4 5	42 14 8	233 8 0	157 19 4	462 16 4	362 2 3	444 0 10	360 2 2
Primary Schools.														
Aided { *Pathsalas*, old,	3	4	89	127	1 2 0	23 0 0	1 11 5	11 9 8	...	...	2 12 10	34 9 0	2 12 10	36 9 8
{ *Pathsalas*, new,	43	72	605	1602	...	60 4 9	...	17 10 1	...	0 9 0	...	78 3 10	...	78 3 10
Unaided *Pathsalas*,	...	2	...	38	...	...	...	...	...	...	...	...	...	...
Total,	46	78	694	1767	1 2 0	83 4 9	1 11 5	28 19 9	...	0 9 0	2 12 10	112 12 10	2 12 10	115 13 6
Normal Schools.														
Government,	...	1	...	12	...	11 1 6	...	...	...	...	...	11 1 6	...	11 1 6
Unaided,	...	1	....	15	...	...	...	...	...	...	...	...	...	...
Total,	...	2	...	27	...	11 1 6	...	...	...	...	...	11 1 6	...	11 1 6
Total Government and Aided Schools,	54	86	1121	2183	379 7 11	451 6 5	120 10 1	153 13 10	233 8 0	158 8 4	598 18 0	763 8 0	591 6 8	761 8 7
Total Unaided Schools,	2	4	102	140	...	...	12 0 2	...	...	...	146 7 6	...	135 3 4	...
Grand Total,	56	90	1223	2323	...	...	...	...	...	...	...	...	...	...

[Sentence continued from page 188.]

only boys of the Bráhman and Káyasth castes, who for obvious reasons wish, in an illiterate country, to keep all knowledge in their own hands. In 1872–73, there was an increase in Hazáribágh District of 90 schools and 2323 pupils. This was entirely due to the establishment of 76 village schools (*páthsálás*), and one training school for village schoolmasters (*gurus*). There was no increase in the number or strength of higher and middle-class schools. The District Committee was of opinion that these lower schools were the real want of the District, which was too backward to avail itself of the advantages of higher or middle-class education. It is worthy of remark that the number of Muhammadan scholars bears a slightly higher proportion to the school-going population, than the Musalmáns do to the total population of the District. The comparative table on the preceding page shows the progress of primary education for the two years 1871–72 and 1872–73, illustrating the results of Sir George Campbell's reformed system.

Postal Statistics.—In 1853 the number of letters received at the District Post-Office was only 139; and the number of letters despatched, 343. From this date and until 1865 no returns are available. Since 1865 the postal business has largely increased, as will appear from the following table, which illustrates the working of the Post-Office of Hazáribágh for the years 1861-62, 1865-66, and 1870-71.

Postal Statistics of Hazáribágh District for the Years 1861–62, 1865–66, and 1870–71.

	1861–62.		1865–66.		1870–71.	
	Received.	Despatched.	Received.	Despatched.	Received.	Despatched.
Private letters,			47,720	48,752	90,592	Information not available.
Service letters,			18,346	18,694	...	
Total letters,	Returns not received.		66,066	67,446	90,592	
Newspapers,			12,616	613	14,312	
Parcels,			1,381	470	1,416	
Books,			1,352	168	1,898	
Total,			81,415	68,697	108,218	
Receipts from cash collections (exclusive of those from sale of Stamps),	£ s. d. 226 7 11		£ s. d. 290 5 10		£ s. d. 464 5 6*	
Total charges,	199 2 3		2671 10 3		3572 9 10	

* Exclusive of receipts from sale of service stamps for official correspondence, which in 1870–71 amounted to £82, 2s. 3d. Service stamps were first introduced in 1866.

ADMINISTRATIVE DIVISIONS.—The District of Hazáribágh is divided into the two following Subdivisions. The population statistics are compiled from Statements 1 A and 1 B, Appendix to the Census Report of 1872; the administrative figures are derived from the special report furnished by the Deputy-Commissioner, and refer to the year 1870–71.

(1.) THE SADR OR PRINCIPAL SUBDIVISION, with the head-quarters of the District at Hazáribágh, contains an area of 5197 square miles, with 4248 villages or townships; 109,848 houses, with a total population of 547,776 souls, of whom 464,978, or 84·9 per cent. are Hindus; 50,375, or 9·2 per cent. are Muhammadans; 1552, or ·3 per cent. are Christians; and 30,871, or 5·6 per cent., are of other religions not separately classified. The proportion of males to the total population is 51·3 per cent.; average number of persons per square mile, 105; average number of villages or townships per square mile, ·82; average number of persons per village or township, 129; average number of houses per square mile, 21; average number of persons per house, 4·9. The Subdivision consists of the ten police circles (*thánás*) of (1) Hazáribágh; (2) Gumiá; (3) Kashmár; (4) Rámgarh; (5) Tandawá; (6) Chatrá; (7) Hunterganj; (8) Barhí; (9) Kodarmá; (10) Bagodar. In 1870–71 it contained nine Magisterial and Revenue Courts, a regular police force of 368 men, and a village watch or rural police of 1236 men. The total separate cost of administration amounted to £12,335, 14s. Hazáribágh has been the head-quarters of the District since 1835, before which date the work of administration was carried on from Sherghátí in the present District of Gayá.

(2.) PACHAMBÁ SUBDIVISION was formed in 1870. It was first styled Karharbárí Subdivision, and the head-quarters were situated at the village of that name; but in 1871 the Subdivisional head-quarters were transferred to Pachambá. It contains an area of 1824 square miles, with 2455 villages or townships; 40,645 houses, with a total population of 224,099 souls, of whom 183,013, or 81·7 per cent. are Hindus; 21,963, or 9·8 per cent. are Muhammadans; 21 are Christians; and 19,102, or 8·5 per cent. of other religions. The proportion of males to the total population is 51·7 per cent.; average number of persons per square mile, 123; average number of villages per square mile, 1·35; average number of persons per village, 91; average number of houses per square mile, 22; average number of persons per house, 5·5. The Subdivision consists of the three police

circles of (1) Pachambá; (2) Kharakdihá; (3) Gáwan. In 1870–71 it contained two Magisterial and Revenue Courts, a regular police force of 44, and a village watch of 431 men. The total separate cost of administration amounted to £1969, 16s.

In 1870–71 there was a third Subdivision at Barhí, on the Grand Trunk Road, 22½ miles north of Hazáribágh, containing one Magisterial and Revenue Court, a regular police force of 145 men, and a village watch or rural police of 478 men. This Subdivision was abolished early in 1872, being thrown in with the Sadr Subdivision; and no separate return of its area and population, &c., was made when the Census was taken in that year.

Fiscal Divisions.—The following list of the Fiscal Divisions or *parganás* comprised in Hazáribágh District is compiled partly from Captain Hunter Thomson's Revenue Survey Report of 1863, corrected, wherever possible, from the results of the later Topographical Survey by Major J. Sconce; and partly from the Board of Revenue's *parganá* Statistics, corrected from a special report furnished in 1875 by the Deputy-Commissioner. The total area is in all cases taken from the Topographical Survey.

(1.) Ahuri contains an area of 152,428·8 acres, or 238·17 square miles, of which 70·32 square miles are cultivated, and 167·85 uncultivated; and is situated within the jurisdiction of the Subordinate Judge's Court at Chatrá. This Fiscal Division is a long irregular strip of country forming part of the north-west corner of the District, where it meets *parganá* Sherghátí of Gayá. It is cut through the middle by the Lilájan river, which, further on, forms part of the southern boundary. A portion of its northern boundary is marked by the river Iam. Towards the centre it is considerably broken by hills and ravines. The chief town of the *parganá* is Chatrá, which carries on a large trade in grains, oil-seeds, &c., and contains a Subordinate Judge's Court.

(2.) Bamanbih: area, 116,185·6 acres, or 181·54 square miles, of which 37·38 square miles are cultivated, and 144·16 uncultivated. It is situated on the edge of the central plateau, immediately south of the Sadr Station of Hazáribágh, and lies within the jurisdiction of the Hazáribágh Subordinate Judge's Court. Part of the northern boundary is marked by the Kunar river. The western portion of the *parganá* is fairly level, but the eastern half is very much cut up by ravines and ridges of rock. Chendwára hill (2816 feet) lies close to the northern boundary, which intersects the Rámgarh Tea Company's plantation three miles south-east of Hazáribágh.

(3.) BARSOT: area, 136,780·8 acres, or 213·72 square miles, of which 80·12 square miles are cultivated, and 133·60 uncultivated. It is situated north of Hazáribágh, and is within the jurisdiction of the Hazáribágh Subordinate Judge. A large portion of the western and northern boundary is formed by the Barákhar river; and the Grand Trunk Road crosses the centre of the *parganá* from north-west to south-west. The chief town is Barhí, 22½ miles due north of Hazáribágh on the Trunk Road, which was formerly the head-quarters of a Subdivision. The southern boundary of the Fiscal Division follows the northern edge of the central plateau of the District, and passes close to Narendga hill, 2250 feet in height.

(4.) CHAI: area, 233,363·2 acres, or 364·63 square miles, of which 128·63 square miles are cultivated, and 236 uncultivated. Subordinate Judge's Court at Hazáribágh. This *parganá* forms part of the northern frontier of the District, where it meets *parganás* Mahair and Jarra of Gayá District. Its northern boundary coincides with the crest of the lower plateau 400 feet above the plain of Gayá, which has already been described. The southern boundary is the Barákhar river, with its tributary the Arganwa *nadí*. The central and southern part of the *parganá* is level and well cultivated; but the northern edge is a mass of confused hill and ravine. In the north-west corner of *parganá* Chai the Grand Trunk Road enters Hazáribágh District by the Dhanwá Pass, rising from an elevation of 583 feet at Chordaná west of the Mohání river, to 1320 at Chaupáran, the head of the pass, where it is joined by the Chatrá road from the south-west. Dr Hooker, *Himálayan Journals*, vol. i. chap. ii., thus describes the stretch of road between Chaupáran and Chordaná:—"Chaupáran at the top of the Dhanwá pass is situated on an extended barren flat 1320 feet above the sea; and from it the descent from the table-land to the level of the Són valley, a little above that of the Ganges at Patná, is very sudden. The road is carried zigzag down a rugged hill of gneiss, with a descent of nearly one thousand feet in six miles, of which six hundred are exceeding steep. The pass is well wooded, with abundance of bamboo, Bombax, Cassia, Acacia and Butea, with Calotropis or the purple *madár*, a very handsome roadside plant, which I had not seen before." In crossing the Barákhar river the Grand Trunk Road leaves *parganá* Chai and passes into Barsot. The road is joined at Chaupáran by the Chatrá road from the south-west. This and the following *parganá* are the legendary homes of the Santál tribe, and every Santál still looks back with regret to the

good times when his race had not yet moved eastwards from their original hunting-grounds in Chai-Champá. For a full account of the tradition, see the section on Aboriginal Races (pp. 65–70).

(5.) CHAMPA: area, 247,987·2 acres, or 387·48 square miles, of which 165·43 square miles are cultivated, and 222·05 uncultivated. It is situated within the jurisdiction of the Subordinate Judge's Court at Hazáribágh. This is the midmost Fiscal Division of Hazáribágh, and embraces the larger part of the central table-land, the northern edge of which coincides roughly with parts of the northern boundary of the *parganá*. The boundary line on the south passes within three miles of Hazáribágh, dividing the Sítágarhá tea-garden at the foot of Chendwára hill. It is generally level and well cultivated, though the north-west portion, around the two hills of Mhuda (2409) and Sindraili (2216), is a good deal cut up by ravines. It contains Hazáribágh, the administrative head-quarters of the District; and Ichák, a small town seven miles north of Hazáribágh, where the *zamíndár* of Rámgarh generally resides.

(6.) CHANGARHÁ: area, 90,809·6 acres, or 141·89 square miles, of which 88·25 square miles are cultivated, and 53·64 uncultivated. Subordinate Judge's Court at Hazáribágh. This *parganá* is bounded on the north by the Dámodar river, and on the west by the Bhera *nádi*, while on the south it touches the rising slope of the plateau of Chutiá Nágpur. In it is situated the village of Rámgarh, which formerly gave its name to the District, and now contains a *garh* or fort of the Rámgarh family. Changarhá is crossed from north to south by the direct road between Hazáribágh and Ránchí. The old road, which is still in existence, runs south-east from Rámgarh to meet the Ránchí and Govindpur road at Golá; the object of the circuit being to avoid the pass which the present road surmounts.

(7.) DANTARA: area, 81,446 acres, or 127·26 square miles, of which 33·12 square miles are cultivated, and 94·14 uncultivated. Subordinate Judge's Court at Chatrá. It lies to the east of *parganá* Ahurí, and forms a projecting point on the north-west of the District, which stretches towards Sherghátí in Gayá District. The river Liláján, running northwards from the high watershed in Ahurí, divides Dantárá into two portions; the eastern of which is broken by entangled ridges and ravine, while the western is level.

(8.) GOLA: area, 288,000 acres, or 450 square miles, of which 139·62 square miles are cultivated, and 310·38 uncultivated. Subordinate Judge's Court at Hazáribágh. Forms the south-west corner

of the District, where it meets Mánbhúm to the west, and Lohárdagá to the south. It is bounded on the north by the Dámodar river, on the west by the Bhera *nadí*, and a considerable part of its southern boundary coincides with the Subarnarekhá. The *parganá* contains the Chainpur range of hills, the highest point of which is 2380 feet. The road from Ránchí to Govíndpur in Mánbhúm passes through Golá.

(9.) GURIA: area, 178,976 acres, or 279·65 square miles, of which 90·12 square miles are cultivated, and 189·53 uncultivated. Subordinate Judge's Court at Chatrá. This Fiscal Division lies about the centre of the western frontier of the District, and contains the fine hill of Kasiátu (2649 feet).

(10.) HOLANG: area, 24,038·4 acres, or 37·56 square miles, of which 14·76 square miles are cultivated, and 22·80 uncultivated. Subordinate Judge's Court at Hazáribágh. This small *parganá* occupies the eastern corner of the central plateau of the District, and is traversed from west to east by the new road from Bagodar to Hazáribágh.

(11.) JOGESWAR: area, 280,006·4 acres, or 437·51 square miles, of which 86·74 are cultivated, and 350·77 uncultivated. Subordinate Judge's Court at Hazáribágh. The southern boundary of this Fiscal Division follows the course of the Dámodar, and the western that of the Kunar river. It is a long strip of country running south and south-east of Hazáribágh, below the elevation of the central plateau. The northern frontier consists of broken rocky country, out of which rises Jhumrá hill (3057), with the tea-plantation of that name. To the south of Jhumrá is the striking hill of Lugu (3203).

(12.) KAINDI: area, 80,032 acres, or 125·05 square miles, of which 50·92 square miles are cultivated, and 74·13 uncultivated; pays a Government land revenue of £205, 4s.; and is situated within the jurisdiction of the Subordinate Judge's Court at Chatrá. It lies on the northern frontier of the District between *parganás* Dantárá and Chai. The Mohání river forms a portion of its eastern boundary.

(13.) KARANPURA: area, 311,545 acres, or 486·79 square miles, of which 116·96 square miles are cultivated, and 369·83 uncultivated. Subordinate Judge's Court at Chatrá. This *parganá* forms the south-western corner of the District. Portions of its southern boundary are marked by the Dámodar river. Almost in the centre stands Máhudí (2437 feet), with the Máhudí tea-plantation on one of its lower spurs, at an elevation of about 2000 feet. Further to the west

is Gondá hill (2241 feet); and Patal hill (2163 feet) lies on the southern boundary.

(14.) PALANI: area, 61,196·8 acres, or 95·62 square miles, of which 36·21 square miles are cultivated, and 59·41 uncultivated. Subordinate Judge's Court at Hazáribágh. This *parganá* is bounded on the north by the Dámodar river, and forms part of the southern frontier of the District, where the face of the Chutiá Nágpur plateau rises from the valley of the Dámodar.

(15.) RAMPUR: area, 502,438·4 acres, or 785·06 square miles, of which 224 square miles are cultivated, and 561·06 uncultivated. Subordinate Judge's Court at Hazáribágh. Rámpur, the largest Fiscal Division but one in the District, is bounded on the north by the Barákhar river, and on the south by the Dámodar; part of the western boundary is defined by the Kunar river, from the point where it quits the central plateau till its junction with the Dámodar, and by the face of the plateau itself. It is divided in half by the Grand Trunk Road, and that part of its eastern boundary which lies between the road and the Dámodar coincides with the course of the Jamuná river. The south-east corner of the *parganá*, where it meets Mánbhúm, is comparatively level, but the central and north-western portions are very much cut up by hills and ravines. The highest hill is Dhargulí (2185 feet), just to the north; but smaller hills, varying from 1000 to 1200 feet in height, are sprinkled over the entire area.

(16.) SINHPUR: area, 23,449·6 acres, or 36·64 square miles, of which 13·32 square miles are cultivated, and 23·32 uncultivated. Subordinate Judge's Court at Hazáribágh. This Fiscal Division lies below the central plateau to the north-east; its northern and western boundaries coincide with the Kunar river.

(17.) TISRI: area, 18,816 acres, or 29·40 square miles, of which 9·13 square miles are cultivated, and 20·27 uncultivated. Subordinate Judge's Court at Hazáribágh. This is a small *parganá*, touching Sinhpur on the south-east.

These 17 *parganás*, embracing a total area of 4417·97 square miles, of which 1385·03 are cultivated, and 3032·94 uncultivated, make up the large estate of Rámgarh, which pays a Government land revenue, according to the Board of Revenue's return, of £2808, 2s. A further account of this estate has been given in the section on Land Tenures (pp. 117–126).

(18.) ESTATE DHANWAR: area, 109,810·7 acres, or 171·58 square miles; revenue not shown in the Board of Revenue's Statistics, but

stated in the Survey Report as £675, 12s. 6d. A full account of this estate is given in the section on the history of the Rájás (pp. 206, 207). It occupies a very irregular area in the centre of *parganá* Kharakdihá, of which it forms part.

(19.) KUNDA: area, 249,740·8 acres, or 390·22 square miles, of which 63·21 square miles are cultivated, and 327·01 uncultivated; held rent free under a grant from a former Rájá of Rámgarh. Subordinate Judge's Court at Chatrá. This wild and hilly *parganá* forms the western portion of the District, where it meets the Districts of Gayá and Lohárdagá. The Morhar river marks a part of the western boundary. At Kundá is the old fort of the Rájá's family—a fine building. For a further account of this *parganá* see p. 207.

(20.) KHARAKDIHÁ: area, 1,301,907·2 acres, or 2034·23 square miles; or, including the Dhanwár estate, 1,411,717·9 acres, or 2205·81 square miles; pays a land revenue of £2748. Subordinate Judge's Court at Kharakdihá. This *parganá* comprehends the forty-seven following estates, locally called *gádís*, held by *ghátwáls* or guardians of the passes under service-tenures, of which the conditions have been allowed to fall into disuse:—(1) Bátí, area in acres, 2204·5, or in square miles, 3·44; (2) Biríá, 21,552·9 acres, or 33·68 square miles; (3) Bharkattá, 18,996·5 acres, or 29·68 square miles; (4) Birní, 23,020·8 acres, or 35·97 square miles; (5) Chachgarhá, 1103·7 acres, or 1·72 square miles; (6) Chak Manjo, 7118·5 acres, or 11·12 square miles; (7) Deopur, 20,805·1 acres, or 32·51 square miles; (8) Deorí, 5061·8 acres, or 7·91 square miles; (9) Deothan, 7558·4 acres, or 11·81 square miles; (10) Dhoritá, 5600 acres, or 8·75 square miles; (11) Dighi, 13,926 acres, or 21·76 square miles; (12) Domá, 6114·6 acres, or 9·55 square miles; (13) Dumchánch, 23,897·6 acres, or 37·34 square miles; (14) Dorandá, 70,188·8 acres, or 109·67 square miles; (15) Dargáon, 13,670·4 acres, or 21·36 square miles; (16) Gándeh, 28,729·5 acres, or 44·89 square miles; (17) Gáwan, 132,460·8 acres, or 206·97 square miles; (18) Ghoranjí, 11,878·6 acres, or 18·56 square miles; (19) Ghoseh, 3443·2 acres, or 5·38 square miles; (20) Gumu, 81,715·2 acres, or 127·68 square miles; (21) Iskoh, 8935 acres, or 13·96 square miles; (22) Jerábághí, 18,802 acres, or 29·38 square miles; (23) Jaridíh, 9516·3 acres, or 14·87 square miles; (24) Khirídíh, 2373·9 acres, or 3·71 square miles; (25) Khesmí, 31,654·4 acres, or 49·46 square miles; (26) Khoksimar, 7262·8 acres, or 11·35 square miles; (27) Kurchutá, 36,565·8 acres, or 57·14 square miles; (28) Kurchutá Ghátí,

11,415·2 acres, or 17·84 square miles; (29) Khargáli, 8179·2 acres, or 12·78 square miles; (30) Kharkhár, 2419·2 acres, or 3·78 square miles; (31) Kiskoh, 38,813·0 acres, or 60·65 square miles; (32) Kodarmá, 69,036·8 acres, or 107·87 square miles; (33) Karharbárí, 40,571·2 acres, or 63·39 square miles; (34) Ledá, 25,259·2 acres, or 39·47 square miles; (35) Latáki, 27,391·6 acres, or 42·80 square miles; (36) Mornán, 3340·8 acres, or 5·22 square miles; (37) Markacho, 29,388·8 acres, or 45·92 square miles; (38) Masnudí, 31,206·4 acres, or 48·76 square miles; (39) Negpurá, 3360 acres, or 5·25 square miles; (40) Naodihá, 9121·4 acres, or 14·25 square miles; (41) Pálganj, 171,462·4 acres, or 267·91 square miles; (42) Pesham, 15,356·2 acres, or 23·99 square miles; (43) Pobí, 4062·3 acres, or 6·35 square miles; (44) Srirámpur, 105,499·5 acres, or 164·84 square miles; (45) Satgáwán, 87,264 acres, or 136·35 square miles; (46) Urárí, 511·4 acres, or 0·80 square miles; and (47) Scattered Government villages, area, 4091·5 acres, or 6·39 square miles.

Parganá Kharakdihá embraces nearly a third of the total area of Hazáribágh, and is bounded on the south and south-west by the Barákhar river. On the east it meets the Districts of Bírbhúm and Monghyr, and the boundary is completed on the west and north-west by *parganá* Chai and the District of Gayá. An outlying portion of the *parganá*, *gádi* Pálganj, is situated south of the Barákhar, which bounds it on the north, while the Jamuná river and Mánbhúm District enclose it respectively on its western and eastern sides. The extreme northern portion of Kharakdihá, consisting of *gádis* Gáwan, Satgáwan, Masnudi, and Kodarmá, is one tangled mass of hill and ravine, from which on the west the peak of Mahábar rises to a height of 2210 feet. The remainder of the *parganá* is undulating and well cultivated, with the exception of *gádi* Pálganj, in which is situated the long ridge of Mount Párasnáth, and a number of isolated hills. The chief markets in Kharakdihá are at Mirzáganj, Kharakdihá, and Dhanwár. Twenty miles of railway traverse the eastern portion of the *parganá*, of which fifteen miles are used for passenger traffic, and three and a quarter form a coal-line connecting the collieries at Karharbárí and Srirámpur with the main line. The road from Girídi railway station to Hazáribágh crosses the *parganá* from north-east to south-east, till it meets the Grand Trunk Road at Dumri. Another road, running north and south, connects the market villages of Kharakdihá and Mirzáganj

with the road from Giridi, through the Subdivisional head-quarters of Pachambá, to Bharkattá on the Grand Trunk Road; and the northern portion of the *parganá* is traversed by the old pilgrim road from Gayá, which takes a circuitous route up the valley of the Súkri, and passes on to the south of Ghoranjí (1983 feet) to Baijnáth or Deoghar.

MEDICAL ASPECTS—CLIMATE.—Hazáribágh is a second-class meteorological station, at which hourly observations are registered on four days in each month, in addition to two daily observations.

The climate of Hazáribágh differs from that of Lower Bengal chiefly in the circumstance that the months of June–September are much cooler and more pleasant, the elevation of the plateau being sufficient to raise it above the effects caused in the plains by diminished radiation after rain has fallen. The winter months are cold and bracing, and the intermediate months of October and March are also agreeable, their average temperature being about 74·5. Even in April and May, when the hot winds sometimes blow fiercely, the average daily temperature of the months is only 83·5 and 86·5 respectively. An average, deduced from the registers for a period of seven years, shows the mean annual temperature of Hazáribágh to be 74·4. In Table X. of the Meteorological Report of 1874, from which the foregoing figures are taken, Hazáribágh is compared with thirty-five other stations in Ceylon, Madras, Bengal, and the North-West Provinces. The results of this comparison show that the average annual temperature of Hazáribágh is below that of any of the others, except Dárjíling. The year 1874 was characterised by a cooler March than usual, an exceedingly hot April and May, and more than average heat in September.

In 1874, the following were the *day* maximum, minimum, and mean monthly temperatures at this station:—January, highest maximum, 82·0; lowest minimum, 37·5; monthly mean, 60·6. February, maximum, 89·0; minimum, 45·0; mean, 64·9. March, maximum, 98·0; minimum, 52·0; mean, 72·1. April, maximum, 1; minimum, 62·0; mean, 85·5. May, maximum, 107·0; minimum, 70·0; mean, 89·7. June, maximum, 97·0; minimum, 69·0; mean, 78. July, maximum, 91·0; minimum, 71·0; mean, 78·9. August, maximum, 88·0; minimum, 70·0; mean, 77·9. September, maximum, 89·0; minimum, 69·5; mean, 78·9. October, maximum, 87·0; minimum, 61·0; mean, 74·5. November, maximum, 83·0; minimum, 49·5; mean, 66·5. December, maximum, 78·0; mini-

mum, 40·5; mean, 60·9. Total for the year, maximum, 107·0; minimum, 37·5; mean, 74·0. The following were the maximum, minimum, and mean readings of the *nocturnal* grass radiation thermometer in the same year:—January, maximum, 49·5; minimum, 23·0; mean, 33·9. February, maximum, 54·0; minimum, 31·0; mean, 41·7. March, maximum, 54·0; minimum, 37·0; mean, 44·5. April, maximum, 61·5; minimum, 45·5; mean, 54·8. May, maximum, 68·5; minimum, 55·0; mean, 62·8. June, maximum, 74·0; minimum, 74·0; mean, 68. July, maximum, 74·0; minimum, 68; mean, 71·1. August, maximum, 73·5; minimum, 67·0; mean, 71·5. September, maximum, 72·0; minimum, 65·0; mean, 70·3. October, maximum, 70·0; minimum, 53·0; mean, 63·5. November, maximum, 64·0; minimum, 39·0; mean, 47·8. December, maximum, 48·0; minimum, 32·5; mean, 39·7. The nights therefore are almost always comparatively cool. The following exhibits the monthly *mean* temperature at the Hazáribágh observatory for the seven years 1867-74:—January, 61·5°; February, 65·9°; March, 74·7°; April, 83·4°; May, 86·5°; June, 82·0°; July, 78·8°; August, 78·0°; September, 77·6°; October, 74·3°; November, 68·0°; December, 61·7°. Mean yearly temperature, 74·4°.

The mean daily range of temperature, as would be expected in a locality of this intermediate elevation, is rather high, amounting in 1874 to 19·3. March, April, and May are naturally the months of highest range. The neighbouring station of Gayá shows a range of 21·1, and Patná of 20·7; but there the colder months give the greatest differences of temperature. The mean humidity of 1874 was 48, and the average of the preceding seven years 51, the mean humidity of Calcutta for the same period being 76.

The rainfall of 1874 was excessive, amounting to 60·21 inches. Rain fell on 134 days through the year. Taking a period of ten years, the average rainfall of each month in Hazáribágh is as follows:—January, 0·31 inches; February, 0·71 inches; March, 0·70 inches; April, 0·44 inches; May, 1·14 inches; June, 8·12 inches; July, 14·32 inches; August, 14·13 inches; September, 8·57 inches; October, 3·69 inches; November, 0·21 inches; and December, 0·06 inches. The average yearly rainfall amounts to 52·40 inches.

During the early part of the cold weather the direction of the wind is almost due west, which becomes north-west in the months of February, March, April, and May. In July and August south-west

winds prevail, changing occasionally to south-east. West winds set in again with the approach of the cold weather.

Vital Statistics.—There are two rural and two urban areas selected for the collection of vital statistics, with the following aggregate population:—Males, 14,486; females, 12,838—total, 27,324. Area in square miles, 37·66; population per square mile, 723. Within these areas, mortality according to disease per 1000 of population was in 1873 as follows:—Cholera, 0·62; smallpox, ·51; fever, 23·05; bowel complaints, 1·35; injuries, 0·10; all other causes, 1·84. Total mortality from all causes, 27·30. The mortality of the urban areas alone was 28·43, which is probably not very much below the true rate. The birth-rate of the same area was 35·73; and the birth-rate within the whole selected area was 32·42.

The town of Hazáribágh is unusually clean and well kept. Drainage is so far natural that unbricked drains suffice. The streets are broad and lined with trees. At the west end of the town, there still remains an old part where the houses are close together and the streets narrow.

Diseases.—The climate of the plateau of Hazáribágh is decidedly healthy, although rheumatism is not uncommon. Malarious fevers of a severe type are less common than in the plains; but there are parts of the District which are unhealthy, owing to the local intensity of malarious poison. This remark more particularly applies to the *tarái* or hill jungle at the north and north-east sides of Párasnáth hill. There are also other spots at the bases of hills which have the reputation amongst the natives, no doubt justly, of being fever-producing localities; but on the whole, it may be broadly affirmed that the District is a healthy one. Dysentery in adults is of course met with, more particularly in the rains, but there is no indication of its unusual prevalence. Inflammatory diarrhœa is common among native children in the rains, but it is very amenable to treatment. Hazáribágh is within the cholera zone—that is, a relatively small number of deaths from this disease in a sporadic form would seem to be the normal state, particularly during the rains. Leprosy is almost unknown as a local disease, and the same may be said of goitre. The new treatment of the former disease by *garjan* oil has been tried at the Hazáribágh Dispensary on the persons of pilgrims, and has proved very successful. Syphilitic affections are frequently met with. Smallpox prevails annually, the outbreak being usually started by native inoculators, notwithstanding that Act IV. (B.C.) of

1865 has been extended to the District. Stone in the bladder and elephantiasis are both very unusual. Cholera was epidemic in 1866, when the European troops (Royal Artillery and 27th Foot) suffered, but not severely. During the first year the 63d Foot was stationed at Hazáribágh, there were a few cases of cholera among the troops, and a large number of cases in the jails. But the mortality was very small.

Vaccination.—Government has definitely declared that the establishment of a self-supporting system of vaccination is its ultimate aim; as the impossibility of an imperial establishment under the control of a special department being able to meet the public requirements has been demonstrated. In Hazáribágh and Chutiá Nágpur generally, the nucleus of a self-supporting system is present ready to hand, in the shape of inoculators of the Sinduriá caste, who under slight pressure are ready enough to become converts to vaccination. In 1874, thirty ex-inoculators worked in Hazáribágh, and vaccinated 10,132 persons. In the same year three inoculators were convicted in Hazáribágh, under Act IV. of 1865. In 1874, 338 deaths occurred from smallpox; April, May, and June were the most fatal months. In about one-fourth of the District vaccination has been fully carried out; and a considerable area round Pachambá, Karharbárí, and Chatrá is described in the Report on the subject as "less than half vaccinated."

Health of the European Troops.—In considering the salubrity of Hazáribágh as estimated by the health of European troops stationed there, it is to be recollected that unhealthy regiments have on several occasions been sent to the station on account of its reputed healthiness; and also that regiments have been sent there immediately on their arrival in India, when it is well known that the mortality is highest. During the ten years 1860–69 three such regiments occupied Hazáribágh. Notwithstanding this fact, the following statement, which is extracted from the *Indian Medical Gazette* of September 1st, 1874, shows that the sickness and mortality of British troops at Hazáribágh contrast favourably with the averages of the Presidency stations for those years. Admission-rate per one thousand of strength in the Presidency, 1754·9; in Hazáribágh, 1535·7. Daily sick-rate in the Presidency, 67·1; in Hazáribágh, 70·5. Death-rate in the Presidency, 29·98; in Hazáribágh, 19·15. The statistics of the three succeeding years, though less favourable to Hazáribágh, still uphold its superiority. In 1870, the admission-rate per one thousand of strength in the

Presidency, 1731·9; in Hazáribágh, 877·1. Daily sick-rate, Presidency, 63·8; Hazáribágh, 32·1. Death-rate, Presidency, 21·90; Hazáribágh, 19·0. In 1871, the admission-rate in the Presidency, 1449·6; in Hazáribágh, 1384·4. Daily sick-rate, Presidency, 57·9; Hazáribágh, 60·9. Death-rate, Presidency, 17·53; Hazáribágh, 16·91. In 1872, the admission-rate in the Presidency, 1514·5; in Hazáribágh, 1118·3. Daily sick-rate, Presidency, 50·8; Hazáribágh, 45·5. Death-rate, Presidency, 27·45; Hazáribágh, 6·83.

The 2d Battalion of the 22d Foot was the last regiment to occupy this station. This corps arrived in India in December 1873 and proceeded at once to Hazáribágh, whence it was permanently removed in November 1874, the immediate cause being the existence of typhoid fever, which had occasioned some twenty deaths during this period. The 2-22d Regiment was relieved by a detachment of the 62d Foot, which has since its arrival been singularly healthy. This detachment was located in one of the barracks, which was specially selected, because less sickness was supposed to have originated in it than in others. A considerable sum was spent in improving the ventilation and drainage. Free access of air was obtained by pulling down neighbouring buildings, laying a new floor, and re-roofing the structure.

If further evidence of the salubrity of Hazáribágh for Europeans is required, the statistics of the European Penitentiary ought to furnish valuable testimony. Most of the prisoners are confined for a long term of years, and but few changes are made. The only misleading element—the previous unhealthiness of the prisoners—would tell against the Station. It is the case that European prisoners who are in a bad state of health are transferred from other jails in Bengal and Bombay to Hazáribágh, and several such transfers have taken place during the present year. Yet there has not been a death in the Penitentiary for three years, and the daily average number of sick in 1873 was 3·37, nearly all for trivial complaints. Turning now to the native jails, the average death-rates for all the jails in Bengal for the years 1871, 1872, and 1873 were 4·05, 5·34, and 4·85 per cent.; while the rates for the Hazáribágh native jails were only 2·41, 1·62, and 2·35 for those years. It is, of course, apparent that the vital statistics of a large central jail, to which there are frequent transfers, and which receives its prisoners from several surrounding Districts in varying conditions of health, cannot be relied on as a definite test. But viewed comparatively, such a steadily low average may fairly be

claimed as more than a confirmation of other facts. On this point the Inspector-General of Jails states in his Report for 1872:—"The Hazáribágh Central Jail enjoyed better health than any other of our larger jails."

A lock hospital has existed since April 1867. The provisions of Act XXII. of 1864 are nominally extended to a radius of five miles around the cantonments, but practically the Act is only enforced in the town. In 1874, the average number of cases under treatment was 13·66. Total monthly cost of the lock hospital establishment, Rs. 83, or £99, 12s. per annum; total expenses under all heads for the year, £133, 8s. 8d.; of which £13 was derived from registration fees, and the remainder paid by Government.

Charitable Dispensaries.—There are now (1875) four charitable dispensaries in Hazáribágh District—at Hazáribágh, Barhí, Ichák, and Chatrá. The following brief account of each is condensed from the Report on the Charitable Dispensaries under the Government of Bengal for 1872. I have not access to any statistics relating to the Chatrá Branch Dispensary, which has been only recently established.

(1.) Hazáribágh Dispensary, established in March 1867, was in September 1872 under the charge of a second-class hospital assistant. The financial condition of this institution is good. During 1872, the sum of £69, 14s. was collected as subscriptions and donations from private sources. The total income of the institution amounted to £174, and the expenditure to £158, 12s., leaving a balance in hand of £15, 8s. The year was a healthy one. Little or no cholera prevailed in the District during 1871 and 1872. There was an epidemic of chicken-pox in January, February, and March. In-door patients: total cases treated, 263; recovered or relieved, 205; died, 29, or 11·02 per cent. of the total cases; average daily number of sick, 14·05. Out-door patients: total number treated, 2721; average daily attendance at the dispensary being 64·34. In the preceding year (1871) the number of in-door patients was 313; and of out-door patients, 3147.

(2.) Barhí Branch Dispensary, established in July 1868, was at the close of 1872 in charge of a third-grade hospital assistant. The dispensary, which has accommodation for eighteen patients, is situated on the Grand Trunk Road, and is used as a refuge for disease-stricken pilgrims. During 1872 the total income was

[Sentence continued on page 206.]

MEDICAL CHARITIES OF THE DISTRICT OF HAZÁRIBÁGH FOR THE YEAR 1872.

Names of Dispensaries.	Date of establishment.	In-door patients.										Out-door patients.		Operations.		Income.			Expenditure.					
		Remaining from previous year.	Admitted during the year.	Total treated.	Cured.	Relieved.	Not improved.	Died.	Remaining at end of year.	Ratio per cent. of deaths.	Daily average number of sick during the year.	Total treated.	Average daily attendance.	Capital or more important.	Minor.	Received from Government.	Received from local and other sources.	Total income.	Paid by Government.			Paid from local and other sources.	Total expenditure.	
																			On account of forms and medicines.	On account of establishment.	Total.			
																£ s.	£ s.	£ s.	£ s.	£ s.	£ s.	£ s.	£ s.	
1. Hazáribágh Dispensary,	1867	15	248	236	188	17	14	29	15	11·02	14·05	2721	64·34	5	42	104 6	69 14	174 0	51 4	53 7	104 6	54 6	158 12	
2. Barhí Branch Dispensary,	1868	1	134	135	93	8	...	31	3	22·96	4·40	894	11·50	2	...	...	56 6	56 6	...	...	...	26 2	26 2	
*3. Ichák Branch Dispensary,	1872	...	...	...	...	...	...	...	...	...	...	302	13·48	1	19	6 4	16 0	22 4	0 12	5 12	6 4	13 6	19 10	
Total, .		16	382	398	281	25	14	60	18	15·07		3917		8	61	110 10	142 0	252 10	51 16	58 14	110 10	93 14	204 4	

* This Dispensary was first established in September 1872. These figures, therefore, refer only to a period of seven months.

[Sentence continued from page 204.]

£56, 6s., collected as subscriptions and private donations; and the expenditure was £26, 2s., leaving a cash balance in hand of £30, 4s. Here, also, the year was healthy, and no epidemic prevailed. In-door patients: total cases treated, 135; recovered or relieved, 101; died, 31, or 22·96 per cent. of the total cases; average daily number of sick, 4·40. The number of out-door patients treated was 894, the average daily attendance being 11·50. As at Hazáribágh Dispensary, the attendance of 1872 was smaller than in 1871.

(3.) Ichák Branch Dispensary was opened in September 1872, under the charge of a vernacular licentiate native doctor. The town committee of Ichák guaranteed a building, and a subscription of £2 a month, the remainder being contributed by the Rámgarh estate. Out-door patients during the year, 302. The total income of that year amounted to £22, 4s., and the expenditure to £19, 10s., leaving a cash balance in hand of £2, 14s.

History of the Landholders.—(1.) Rámgarh.—The estate of Rámgarh embraces an area of 4417·97 square miles, nearly two-thirds of the entire District of Hazáribágh, and pays in land revenue the extremely light assessment of £2808. The net income of the *zamíndárí* is estimated at from £20,000 to £30,000 a year, which is a small return from so large an area. A very large proportion has, however, been made over to subordinate holders in the form of grants for religious and military service, which yield only a nominal rent. The Rámgarh Rájás are by origin Kharwárs—a tribe which Colonel Dalton considers to be of purely Turanian descent, and possibly identical with the Kirátís of Sikkim. A sketch of the family history has been given in the section on Land Tenures (pp. 117, 118).

(2.) Dhanwár.—The Dhanwár estate contains an area of 109,810 acres, or 171·58 square miles, and pays to Government a revenue of £675, 12s. The net rental of the estate is now about £3900, having increased largely since it has come under the management of the Court of Wards. The Rájás of Dhanwár profess to trace back their descent in an unbroken line of fifty-one chiefs to Hansráj Bhut Deo, who came from Southern India, expelled a Rájá of the Bandáwat caste, and conquered for himself in Gayá and north Hazáribágh a kingdom that extended for six hundred miles. The High Priest of Deoghar invested him with the title of Rájá, marking his forehead with the *tiká*, or symbolic mark of sovereignty, and empowered him to confer a similar distinction in a slightly different form on his own

feudatories. The practice of giving the *tíká* to their feudal tenants was maintained by the Rájás of Dhanwár until recent times, and only fell into disuse during the lifetime of the present Rájá, owing to the action of the British courts, which declined to recognise it as an essential preliminary to possession. The holders of *ghátwáli* or military service-tenures in Kharakdihá still, however, retain the title of *tíkáyat*, or bearer of the *tíká*, although the ceremony may not actually have been performed. It is curious that, whereas the ancestor of the family received his *tíká* from the thumb of the Deoghar priest, the feudatories of the Rájá had to take their mark of investiture from that chieftain's great toe, besmeared with ashes. A sketch of the family history has been already given on pp. 129–133.

(3.) KUNDÁ.—The traditions of the Kundá family say that the first Rájá was a Garhwál Rájput, and a personal servant of the Emperor Aurangzeb, from whom he obtained a rent-free grant of the Fiscal Division of Kundá, on condition, as the *sanad* recites, of "guarding the four passes of Bábaltán, Pinjri, Banwádi, and Nagdarrá from the inroads of the Mahrattás, Bargis, and Pindárís." In 1771 Captain Camac passed through Kundá with a British force, on his way to instal Gopál Rái as Rájá of Palámau. Dhrija Náráyan Sinh, fourth Rájá of Kundá, joined Captain Camac's expedition, and four of his relations were killed by the Cheros at the storming of the Palámau fort. On his return from Palámau Captain Camac gave the Rájá a fresh *sanad* of Kundá, confirming the original *sanad* of Aurangzeb and granting 328 rent-free villages in perpetuity. In 1797, the grant was a second time renewed by Mr William Hunter, then Collector of Rámgarh, of which District Palámau formed a part. The Kundá estate now contains 332 villages; 124 of which the Rájá retains under his own management; 146 are held as feudal under-tenures, paying from two to five rupees annually as compliment-money (*salámí*) at the *Dasahará* festival; and the remaining 62 have been granted to Bráhmans, for religious service (*pujá páth*) and maintenance (*khairát*). These latter tenures pay no *salámí*. Both feudal and religious tenures escheat to the estate on the failure of male heirs of the grantee. The total rental from all sources is stated to be £800. The present Rájá, Rámeswar Náth Sinh, fifteenth in descent from the founder of the family, lives at Kundá.

JAINS: THEIR HISTORY.—The precise date at which the Jain religion arose ranks among the more obscure problems of Indian history. The conjectures made by the best authorities range from

the sixth or seventh century before Christ to the tenth century after Christ. Colebrooke assumes that Mahávíra, the last of the Jain Tirthankaras or deified saints, was the teacher of the founder of Buddhism; while the Rev. J. Stevenson, arguing from the fact that the Buddhists say that Gautama had twenty-four predecessors, a number which corresponds with the twenty-four Tirthankaras of the Jains, writes that "Gautama, from the force of natural genius, threw their system entirely into the shade, until the waning light of Buddhism permitted its fainter radiance to reappear on the western horizon." Professor Wilson's earliest opinion, in which Lassen concurs, was that the sect arose in the Dakhin during the second century after Christ; but subsequently he placed them as late as the decline of Buddhism, in the beginning of the eighth century. Benfey, on the other hand, thinks that they sprang from the struggles of the Buddhists with the Bráhmans in the tenth century A.D. It may be assumed at the outset that the statements of Jain writers are untrustworthy, both on the ground of their unhistoric character, and the natural tendency to exaggerate the antiquity of their sect. The most valuable independent testimony is that of the inscriptions of the Chálukya dynasty of Kalyání, which show that the Jains were influential under Pulakesi, a king who reigned from 485 till 510 A.D. And if it be admitted that the Jains arose in Northern India, it is obvious that some time must have been required for the sect to spread itself into the south. It would be out of place here to enter into further details of the testimony afforded by inscriptions, the more so, as each item of evidence involves of itself a separate controversy. We are thrown back, therefore, upon such internal evidence as can be derived from the Jain religion, ritual, and philosophy. This appears to point with tolerable certainty to the conclusion that Jainism, in spite of the claims of its adherents to a higher antiquity than Buddhism, was really an offshoot from that religion, and may not unfairly be described as a compromise between Hinduism and Buddhism. The most striking resemblances between the two in point of terminology, doctrine, and religious practice may be briefly summarised. *Jina*, or vanquisher of human infirmities, and *Arhat*, or one worthy of the homage of gods and men, are titles both of Jain Tirthankaras and of Gautama Buddha himself. Siddhártha, the 'stablisher of faith,' the name of the father of Mahávíra, is the proper name of Buddha; both are of the race of Ikswháku; Mahávíra's wife was Yasodá, as Buddha's was Yasodhará; Mahávíra

died at Páwá in Behar, about 527 B.C., and Buddha near the same place in 543 B.C. The term *Srávakas*, or hearers, the general name of the Jain laity, is applied by the Buddhists to those who practise the first precepts of their religion, but fail "to emancipate themselves entirely from the influence of passion and prejudice." Both religions pay divine homage to their teachers, and erect statues to them in their temples. Both also profess the doctrine of *ahinsá*, which makes it a sin to destroy animal life. Both are adepts at inventing periods of time of enormous and inconceivable duration; and what is more striking, both revere a series of saints or teachers of decreasing longevity and physical stature. A comparison of the Jain and Buddhist series irresistibly suggests the conclusion that the Jains have merely magnified the Buddhist ideas; and it is curious that in both cases the series ends with a being of little more than the ordinary age of man, who is in each case conjectured to be the founder of the sect.

JAIN PHILOSOPHY starts by affirming the existence of two categories, in one or other of which all things and persons are included—*jíva*, spirit or life, and *ajíva*, matter or not-life. Life is defined to be "without beginning or end, endowed with attributes of its own, agent and enjoyer, conscious, subtle, proportionate to the body it animates. Through sin, it passes into animals or goes to hell; through virtue and vice combined, it passes into men, and through virtue alone ascends to heaven; through annihilation of both vice and virtue, it obtains emancipation." *Ajíva*, on the other hand, embraces all things which are devoid of consciousness or life, and is the passive object of enjoyment on the part of *jíva*. Matter is ultimately analysed into an aggregate of homogeneous atoms, and the idea of time is one of the subdivisions of *ajíva*. Both Life and Matter are uncreated and imperishable, though both take various forms and appear under different conditions of being. Thus Life, understood as the unchanging vital principle, goes through a series of migrations from a lower to a higher grade of existence, until it attains *moksha* or final liberation. The bulk of the Jain philosophy consists of a statement of the causes which hinder or promote this consummation, each cause being minutely divided and subdivided in a way it would be tedious to recount. The chief impediments to liberation are—*pápa* or sin, which is defined as the cause of unhappiness to mankind, and under which are included all human passions and infirmities, not excepting

laughter and love. Next to this ranks *ásrava*, which directs the embodied spirit towards external objects, and thus renders it subservient to mere fruition. *Bandha*, the bondage of the soul, is the association of life with action, and consists of a succession of births and deaths, the results of works done in the flesh. These hindrances to liberation are counterbalanced by *samvara*, which is the power of rightly directing and controlling the senses in contradistinction to *ásrava*, their wrong direction; and by *nirjará*, or the practice which destroys or wears away earthly impurities. This latter is divided into external *nirjará*, comprising fasting, continence, silence, and bodily suffering; and internal *nirjará*, which consists in repentance, piety, protection of the virtuous, meditative abstraction, and disregard of both virtue and vice as mere modes of action. *Moksha*, or final liberation from the chain of works, is thus described:—"As a bird let loose from a cage, plunging into water to wash off the dirt with which it was stained, and drying its pinions in the sunshine, soars aloft, so does the soul released from long confinement soar high, never to return." Again, the "*Nava Tatwa*" (Stevenson's translation, ed. 1848) says:—"Emancipation is only obtained through the sacrament of the highest asceticism, in that path of rectitude in which there is no retrogression, through the possession of perfect knowledge and vision, and in the practice of abstinence. The space occupied by each of the Perfect is boundless, and increases according to any one's desire. The term in which they remain in this state is also infinite. Their parts are innumerable. There is no returning again to a worldly state, and no interruption to their bliss. They have perfect vision and knowledge, they have no dependence on works, but exercise themselves according to the highest philosophy. Such is the life of the Perfect." But the precise state of those saints, who attain the only knowledge (*kevalajnána*) and only vision (*kevaladarsan*) which *moksha* reveals, is still left in comparative obscurity. From the use, however, of the term *nirvána* as a synonym for *moksha*, it may be inferred that the philosophical meaning of the latter term is annihilation. This would be perfectly consistent with its being popularly understood as an undefined state of happiness, the reward of self-denial in the present life. It certainly does not mean absorption into any divine being, personal or impersonal. For Jain philosophy evades the problem of a First Cause, and, treating life and matter as eternal, occupies itself only with inquiring how the soul may escape from the incidents of bodily existence.

On the speculative affinities of the Jain system Lassen writes as follows:—"In this system a syncretism meets us, to which Buddhism, the Vaiseshika, and Sánkhya philosophy have contributed. The doctrine—that by a perfect cognition and strict observance of the teaching of a religious or philosophical sect, the liberation of the soul from its fetters may be attained—is Buddhistic, or, more accurately, almost universally Indian. The opinion that matter is eternal, and that there are only four elements, is Buddhistic. The idea that all things are composed of atoms, belongs to the Vaiseshika school, although this doctrine had been more developed by Kanáda than by the Jains. That philosopher, moreover, considered time as a special category. Kapila teaches that by four states the liberation of the spirit is impeded, and by four others promoted; he arranges them, however, in a logical manner, so that the progress from the lowest state to the highest, *i.e.*, to that of *dharma* or virtue, is well established, whilst such is less the case in the arrangement of the Jains. The sect now under discussion borrowed from that philosopher probably also the idea of an ethereal body, with senses formed of ideal elements, wherewith the soul is invested." ("Indische Alterthumskunde," iv. 755, translated by E. Rehatsek, M.C.E., in the *Indian Antiquary* for July 1873.) I have omitted the four states of liberation which Lassen describes, owing to the obscurity and confusion of the Jain account of them.

Before leaving the subject of Jain philosophy, it may be well to notice their eclectic doctrine of *syádvá* or "perhaps." This is an attempt to reconcile certain contradictory statements, such as "a thing is" and "it is not," characteristic of the different schools of philosophy, by the reply *syádvá* "it may be so sometimes." As a philosophical speculation the thesis is valueless, but it suggests the inference that Jainism was later than the other schools; while, on the other hand, as this doctrine was opposed by Rámánuja, it certainly dates from earlier than the twelfth century.

With reference to this principle, which professes to find truth by arriving at a middle term between two contradictories, it may not be out of place to point out that a similar doctrine, brought into greater prominence, and made the keystone of a system, is familiar as the first and last word of western metaphysics. Five hundred years before Christ, Heraclitus taught that all things were in "a perpetual flux and reflux;" or, to take another form in which he asserts the same principle, "all is, and all is not, for though in truth

it does come into being, yet it forthwith ceases to exist." More than two thousand years after, in 1817, Hegel enunciated his great logical law of the identity of contradictories, avowedly based upon the foregoing dictum of Heraclitus, and expressed by Hegel in an axiom which might equally have been borrowed from Heraclitus or from Jainism—the famous "Being and Non-Being are the same." It would hardly be pressing the parallel too far to compare the Vedántín criticism on the Jains, "to say that a thing is and is not, is as incoherent as a madman's talk or an idiot's babble," with the ridicule which Hegel's canon called forth in England.

JAIN SACRED LITERATURE shows no trace of Buddhistic influence, but is chiefly modelled on Bráhmanic writings. Legends borrowed from Hindu mythology are occasionally inserted; and the *Charitras*, such as the *Párswanáth Charitra*, are described as a sort of *Purána*. Similarly, the Jain cosmogonies are to a large extent imitated from the *Puránas*. These cosmogonies are, in fact, symbolic descriptions of the world; which in one case is described as resembling three cups placed one over the other, the lowest being upside down, while the upper and middle touch each other at their circumferences. In another case, the world is presented as a woman sitting with folded arms. Her face and breasts are heaven, the habitation of the gods, the middle portion of her body is the earth, and the lower portion stands for the regions beneath the earth.

RELIGION.—To turn to the Jain religion, so far as it can be separated from the philosophy. The most characteristic tenet is the denial of the divine origin and infallible authority of the Vedas. Professor Wilson has pointed out that this disregard of the Vedas is due to the fact that they enjoin sacrifices; and that the *homa* or burnt offering, which forms a part of all Bráhmanic ceremonies, must of necessity destroy a large number of insects every time it is celebrated. It should be observed that, in spite of this, the Vedas are admitted as an authority wherever they agree with Jain tenets. Secondly, the reverence for the Jinas or Tirthankaras, mortal men who have by their austerities acquired a position superior to some of the Hindu gods whom the Jains admit into their system. The most popular among the twenty-four Tirthankaras are Adinátha, Neminátha, Párswanátha, and Mahávíra. This has already been noticed as a point of resemblance to the Buddhists, and the same applies to the five Jain *mahávratas* or chief moral precepts, which are almost identical with the Buddhist *panchasila*; tenderness for

animal life, truth, chastity, honesty, and restraint of worldly desires. Besides these great tenets, there are a variety of minor and somewhat grotesque instructions, such as not to eat in the open air while it is raining or after dark, for fear of swallowing a fly; to strain water thrice before drinking it, and not to walk against the wind lest it should blow insects into the mouth. Jain *Yatis* or devotees even go so far as to carry about with them an *ughá* or brush, to sweep insects out of the way when they sit down, and a *mohomati* or mouth cloth, that no insects may be swallowed when they are engaged in prayer.

The characteristic objects of worship of the sect are the Jinas or Tirthankaras. The word *tirthankara* itself is explained by Lassen to be of Bráhmanic origin, meaning a preparer of a *tírtha* or place of pilgrimage; but Wilson renders it "one who has crossed over (*tíryate anena*), that is the world, compared to the ocean." They seem to be regarded, at any rate in theory, as deified saints, each of whom declared a particular institute for the purification of the world; and this view of their function may be summed up by saying that the Jain *tírtha* is a moral one. Besides the Tirthaṅkaras, the Jains recognise the existence of the Hindu gods, and admit to their worship such of them as are connected with the history of their own saints. Frequent mention is made of Indra or Sakra; and images of Sarasvatí, Devi, Bhaváni, Hanumán, Bhairava, and Ganesa, are found in their temples. There is also what may be called a special Jain pantheon, comprising various orders of supernatural beings, the most curious among whom are the *Sásanadevis* or female satellites of the Jinas, who appear to be copied from the *Saktis* or consorts of the Bráhmanic deities.

Jain ritual and religious practice is extremely simple both for priests and laymen. Meditative abstraction from worldly affairs is the first duty of a *yati* or professional devotee; and he is therefore entitled to dispense with all external acts of worship at his pleasure. It is usual, however, for the Scripture-reader in a Jain temple to be a *yati;* and I have myself seen one of these devotees reciting in a monotonous chant a history of one of the Tirthankaras, as part of his private devotions. He was sitting cross-legged on a common bedstead (*chárpái*), in one of the cloisters of the *nichli*, or lowest temple at Madhuban, with his book, a handsomely bound and well-written volume, propped on a small reading-desk in front of him. With his left hand he held the *mohomati*, or mouth cloth, close to his lips, and

the *ughá*, or brush to sweep away insects, was lying beside him. As he read, he rocked himself backwards and forwards in tune with the recitation. The religious duties of a *sráwak*, or lay votary, as described by Professor Wilson, are by no means onerous. The worshipper should visit daily a temple containing images of the Tirthankaras, walk round it three times, do obeisance to the images, and make an offering of fruit or flowers, repeating some such invocation (*mantra*), as:—"Salutation to the *Arhats*, to the Pure Existences, to the Sages, to the Teachers, to all the Devout in the world." A morning prayer is also repeated:—"I beg forgiveness, O Lord, for your slave, whatever evil thoughts the night may have produced—I bow with my head." The day's devotions are finished by hearing read part of the *kalpe sutra*, or the life and conduct (*charitra*), of one of the Tirthankaras.

In the department of personal religion are enjoined two practices of markedly Buddhistic origin—auricular confession, and observance of a special season of religious meditation. Every orthodox Jain should confess to a priest and obtain absolution at least once a year, at the commencement of the holy season. Feasts of various kinds are imposed as penances. The Paryúshana (vernacular *pajjúshan*), or period of seclusion, fasting, and reading religious books, corresponds to the Buddhist Wasso, and is divided into two sections—comprising respectively the fifty days that precede, and the seventy days that follow, the fifth day of the bright half of the month Bhádra. The second period, therefore, would commence about the 26th of July. The Svetámbara, or white-robed sect of Jains, fast during the first period, and the Digambara sect, who wear coloured robes, during the second. The distinctions between the two sects are detailed below. It is impossible to avoid noticing the curious resemblance, so far as these two practices are concerned, between Jainism and Roman Catholicism, the more so perhaps as the Abbé Huc, a Catholic writer, in his "Travels in Tibet," remarks freely on the similarities between Buddhist and Roman Catholic ceremonials.

In speaking of the origin of Jainism, I have already suggested the inference that it was in the first instance a schismatic offshoot from Buddhism, and that its later development took the form of a compromise between that religion and Hinduism. This inference derives considerable support from the fact that, speaking generally, the traces of Buddhistic origin are strongest in the more esoteric doc

trines, which could hardly have been imposed on them from without; while the influence of Bráhmanism shows itself most clearly in matters of religious and domestic ceremonials, and the observance of festivals.

The most prominent among the points which indicate a connection between Hinduism and Jainism, is the fact that the priests in Jain temples are Bráhmans. On this Wilson writes:—"The reader in a Jain temple is a *yati*, or religious character; but the ministrant priest, the attendant on the images, the receiver of offerings, and conductor of all usual ceremonies, is a Bráhman. It is a curious peculiarity in the Jain system, that they should have no priests of their own; but it is the natural consequence of the doctrine and example of the Tirthankaras, who performed no rites, either vicariously or for themselves, and gave no instruction as to their observance. It shows, also, the true character of this form of faith, that it was a departure from established practices, the observance of which was held by the Jain teachers to be a matter of indifference, and which none of any credit would consent to regulate; the laity were, therefore, left to their former priesthood, as far as outward ceremonies were concerned." The Jains also recognise the Bráhmanical fiction of four castes, and the Bráhmans in their turn receive as a Kshatriya or Vaisya, a Jain who has renounced his own religion. They observe the *sanskáras* or ten essential ceremonies of the higher castes, and they worship some of the household gods of the chief Bráhmanic sects.

The special Jain festivals kept in Bengal are pilgrimages to the following localities:—(1) The temple of Pársvanátha, the twenty-third Tirthankara or deified saint, on Samet Síkhara, or Párasnáth Hill, in Hazáribágh District; (2) The temple of Mahávíra, the twenty-fourth and last Tirthankara, at Pápapuri or Apápapuri in South Behar; (3) The temples of the same Tirthankara at Nawáda, also in South Behar; and (4) The temple at Purí, in Orissa, where the *pádukas* or foot-prints of Mahávíra are shown to pilgrims. Besides these, which are peculiarly their own, the Jains observe certain Hindu festivals, such as the *Vasanta yátrá*, or vernal festival; the *Sripanchami*, and the *Akshaya tritiá;* and have written rules for the *Ghará sthápana*, when Deví is supposed to be present in a water-jar set up as her emblem.

Jains are divided into two great sects, the Digambara or 'sky-clad,' who wear coloured garments; and the Svetámbara or 'white robed,'

who dress in white. This distinction of dress applies only to *yatis* or devotees, and is not observed by laymen. The early Digambara Jains are said to have worn no clothes at all; and this tradition has induced some writers to identify them with the Gymnosophists of the Greek accounts of India. Lassen, however, rejects this view on the ground that, looking to the ordinary Greek use of γυμνός, the term οἱ Γυμνοσοφισταί does not imply total nudity, but merely refers to the scantiness of attire of Bráhmanic ascetics and philosophers. The evidence of the earlier accounts being thus eliminated, there remains only the gloss of Hesychius, who lived near the end of the fifth century, Γέννοι—οἱ Γυμνοσοφισταί which is hardly enough to base a theory upon. Total nudity, at least in public, has long ceased to be the distinctive tenet of the Digambara sect, though traces of the practice remain in their habit of taking their food naked, and of declining to decorate the images in their temples with any kind of ornament. The Svetámbaras, on the other hand, take their meals clothed, and adorn the images of the Tirthankaras with ear-rings, necklaces, armlets, and tiaras of gold and jewels. They also wear white garments, in opposition to the Digambara practice of dressing in colours. The Digambaras, again, deny that the use of the face-cloth to guard the mouth, and of the brush for sweeping away insects, is essential to the character of an ascetic; while the Svetámbaras lay great stress on these practices. Another prominent distinction occurs in the position which the two sects assign to women. According to the Digambaras, women cannot attain *nirvána* or final annihilation, a privilege to which they are admitted by the Svetámbaras. From the fact that in early Hindu philosophical writings the Jains are called Digambaras or *nagnas*, naked, Professor Wilson argues that the Digambara sect is the more ancient of the two. It should be noticed, however, that the practice of nudity is said to have been enjoined by Mahávíra, the twenty-fourth Tirthankara, in opposition to the teaching of his predecessor Pársvanátha; and that the denial by the Digambaras of the necessity for using the fly-brush and mouth-cloth, would seem to be characteristic of a reforming sect.

From the foregoing general account of Jainism I have omitted as uninteresting the detailed list of the twenty four Tirthankaras, with their legendary history and parentage; and I proceed to explain the connection of the sect with the District of Hazáribágh.

The Párasnáth Temples.—The Jains hardly form a distinctive part of the population of Hazáribágh. No separate enumeration of

them was made in taking the Census of 1872; and although their number has been estimated at five thousand by the Deputy Commissioner, this estimate is merely conjectural. In fact, the religion of the secular members of the Jain community is not prominent enough for them to be easily distinguished from the general mass of Hindus; and the religious Jains, who live in the temples at the village of Madhuban under Párasnáth Hill, are few in number and socially insignificant. The only excuse, therefore, for noticing Jainism at length in a Statistical Account of Hazáribágh District, is the fact that Párasnáth Hill is the eastern metropolis of the religion; and that South Behar generally was, probably, the centre from which Jainism spread towards Southern and Western India. The great stream of Jain pilgrims to Párasnáth commences about the beginning of December; and when I visited the Madhuban temples at the end of March, I found a few strangers still there, one of whom was a man of good social position who had come by rail from Guzerá. He was waiting to attend the car festival of the Digambara sect of Jains, which was to take place the next day. This festival, as I was informed on the spot, is peculiar to the Digambaras, and a *rath* or ceremonial car is kept in the precincts of the temple of that sect. Two elephants are harnessed to the car, as the road to the shrine, which Párśvanátha is taken to visit, is too rough for the worshippers to draw it. The Digambara priests could not tell me any reason why Párśvanátha should leave his temple, and it seemed at first sight as if the idea of the car festival had been borrowed from Hinduism. The following passage, however, is conclusive as to its origin:—"The Chinese traveller Fa Hian gives a curious account of the yearly procession of the Sacred Tooth from its regular chapel to a shrine some way off, and of its return after a stay there. This was in the fifth century, A.D.; but the account applies so exactly to the car festival at the present day, that one of the most accurate of Indian observers pronounces the latter to be 'merely a copy.'"

The special sanctity of Párasnáth Hill, which yearly attracts about ten thousand pilgrims from distant parts of India, arises from the fact that it was the scene of *nirvána* of no less than ten of the twenty-four deified saints, who are the objects of Jain worship. From the last of these, Párśva or Párśvanátha, the hill originally called Samet Sikhar has derived its second and better known name of Párasnáth. Párśvanátha is stated in the Jain accounts of his life to have been born in Bhelupura, a suburb of Benáres, of the royal

race of Ikshwáku. He is usually depicted as having a blue complexion, with a hooded snake for his *chinha* or cognizance, and is sometimes represented sitting under the outspread hoods of a many-headed snake. Jain tradition, as recorded in the *Párswanátha Charitra*, says that while the saint was absorbed in religious abstraction, a jealous enemy caused a heavy shower of rain to fall upon him. On this the king-serpent Dhárana came to the spot, and sheltered the devotee with his outspread hood. According to Jain chronology, Párswanátha died at the age of one hundred, when fasting, with thirty companions, on Párasnáth Hill.

Lassen, while rejecting, on independent grounds, the Jain account of the date of Párswanátha's death, thinks that he was probably the real founder of the sect. His immediate predecessor, Nemi, is said to have attained an age of one thousand years; and the sudden descent in the series to an age little exceeding that of ordinary men, seems to justify the inference that the last Tirthankara was a historical person. Little is known of Párswanátha's teaching, and the bulk of the Jain doctrine is attributed to his successor, Mahávíra. He it was who, rejecting Párswanátha's practice in the matter of clothes, became himself a naked ascetic, and founded the Digambara, or "sky-clad" sect. He also assigned to *jíva*, or spirit, an objective reality as the one vital principle which animates all living bodies, and which, after a series of migrations through various forms of life, achieves by supreme knowledge and virtue its true destiny, in final liberation from the bonds of mundane existence. In teaching this, and in affirming the reality of matter (*ajíva*), he rejected the two fundamental precepts of Buddhism,—its denial of all reality in creation, and its theory of the material world as the result of ignorance and illusion. If, then, Párswanátha be considered the founder of Jainism, the further development of the religion and the propagation of its most characteristic tenets was the work of Mahávíra. Both these Tirthankaras died in South Behar; and as that country is still one of the great centres of Jain pilgrimage, it is not unreasonable to suppose that Jainism spread from thence to the other parts of India.

Madhuban is situated on the north side of Párasnáth, on the last slope which rises towards the base of the hill. The road to Madhuban turns off from the road to Hazáribágh at the 16th mile from Girídi; and from a ridge a little before this point, the temples are seen as a gleaming white spot on the dark back-ground of Párasnáth. On leaving the main road, Madhuban is lost to view; but after wind-

ing for three miles through jungle, a sudden turn in the branch road brings the temples into sight quite close at hand. Seen from this point, three tiers of temples rise one above the other, showing some fifteen shining white domes, each surmounted by bright brass pinnacles, and in the case of the Svetámbara temples, by red and yellow flags. The whole forms a dazzling white mass of masonry, set against the huge bulk of Párasnáth dark in shadow. There are now three temples, known respectively as the *Uparlli* or Gwálior, the *Majhli* or Murshídábád, and the *Nichli* or Calcutta *mandir*. The anonymous writer quoted below, who visited Madhúban in 1827, enumerates four temples; and I can only conjecture that two of those which he saw have since been amalgamated into one. The present *Uparlli* or Gwálior temple, which stands on the top of the slope and at the very base of the hill itself, was built about fifty years ago by Rájendra Bhukan Bhattárakji, a wealthy merchant of Gwálior. The Digambara form of worship is followed; and it is supported by the contributions of pilgrims, and an endowment given by the founder. The *Majhli* or Murshídábád temple stands immediately below the Gwálior one, and belongs to the Svetámbaras. It was founded by the banking family of Seth at Murshídábád, and is the richest of the three temples at Madhuban. The *Nichli* or Calcutta temple stands the lowest in the tier, and was founded by a Calcutta merchant whose name I have been unable to ascertain. Each of the temples consists of an inner and an outer quadrangle. The outer quadrangle is built like a cloister with cells for lodging pilgrims, and various kind of out-houses. Over the gate of the inner quadrangle is a *naubat kháná* or musicians' gallery, where flutes and drums are played at daybreak, at 8 A.M., at noon, and at sunset. The rest of the inner quadrangle is occupied by temples with foliated domes, containing images of the Tirthankaras. On the summit of these domes the Svetámbara Jains erect a pole with a short cross-bar surmounted by three brass knots, and also fly a red or yellow flag. This, as their priests informed me, is to show that Párśvanátha is at home. No such symbol is used by the Digambaras. The priests of both sects agreed in telling me that the relations between themselves and their rivals were most amicable.

In 1827, a government officer visited Párasnáth by way of Pálganj, and wrote an account of his visit, signed with the initials A. P., in the *Calcutta Quarterly Magazine* for that year. Of late years no European has been allowed to enter the Madhuban temples, and I therefore quote the following paragraphs from his account:—

"The village of Pálganj is beautifully situated between the large woods that spread to the north and east, and the gradually rising hills to the south-west, that concentre at last in the majestic pile of Párasnáth. From this point of view, this fine mountain forms a screen along the greater part of the southern horizon—the deep blue tinge, which it wears at sun-set and moonlight, struck me as different from any effects of light and shade which I had observed in other mountainous countries.

"At Pálganj commence the devotional duties of the Jain pilgrims, who flock to this remote spot from every part of India, even from the furthest provinces of the Dakhin. The *zamíndár*, who has dubbed himself with the title of Rájá, is considered by that sect as the guardian of the holy lands, and has in his possession a small image of Párshvanátha, which every pilgrim pays for worshipping, before he proceeds to the temples at the foot and on the summit of the mountain. The Rájá shows a small image of stone, which he affirms to be that found in the tank by the direction of Párshvanátha. Its rude appearance, however, and small size (not above 8 inches high) clearly betray that it was made at Pálganj, probably by the same person who invented the fable attached to it. In posture it is an imitation of the idols peculiar to the sect, and is not otherwise worthy of description.

"There are two images of Párshvanátha in the possession of the Rájá, besides this old and rude one :—one inscribed with the name of Bindraband Sa, of Gwálior, by whom it was given to the Rájá; and another which has been lately sent from Dehli by a *mahájan* in whose charge the old idol was broken about three years ago, while being carried from Pálganj to Madhuban, where the temples stand. The broken image, which is the most beautiful, represents a naked figure sitting cross-legged in that attitude of abstract meditation which is peculiar to all the idols of the Jains, with the exception of the gigantic figures of Gomat Iswar at Belligola and Kurkul. It measures one foot three inches high, and is cut out of a single piece of black marble with very fair proportions. Comparing this figure with the plates attached to Mr Colebrooke's article on the Jains, in the 9th volume of the *Asiatic Researches*, it appears to differ from them in the superior beauty of its form and features, the closed appearance of the eye-lids, two rows of necklaces round the neck, and the *chattra* rising over the head from the back of the *tiara* that encircles the brows. The *chattra* distinguishes the image of Párswa

or Pársvanátha from those of the other twenty-three Tirthankaras, which are otherwise undistinguishable by posture or appearance. It is related in the Jain *Sástras*, that, in token of approbation for his piety, the deity sent a snake to preserve this favourite saint from the approach of all contaminating things during the period of his *tapasyá*, or abstract devotion; the obedient animal crawling up the neck of the honoured devotee, arched his hooded head above his crown, and retained this attitude of protection and watchfulness until the apotheosis of his ward. This is the form represented by the marble image; though it was explained to me that the *chattra* is composed of 20 hoods of the Cobra di Capello.

"The more ignorant pilgrims, believing that the image of Pársvanátha was found by the Rájá at the bottom of a tank, in consequence of a revelation from the god himself, commence their devotions at Pálganj by propitiating the guardian of their *Deotá*, and procuring his permission to worship the idol and his charge. Every visitor, of whatever consequence, considers this commencement of his duties absolutely necessary. Arrived at the village, the first proceeding is to settle with the *díwán* the day and hour at which they can be admitted to the presence of the Rájá. This latter individual himself is one of those many examples of idiocy, to which the ministers of such persons too often intentionally reduce their masters, with a view to the usurpation of all authority in their estates. The *díwán*, at the time of my visit, was an adept in such matters; and persuading both the Rájá and his heir that prayer and ablution were the only occupations becoming a terrestrial representative of the deified saint, had appointed a Kanauj Bráhman to direct them in these difficult ceremonies.

"The day of ceremony being fixed, the Rájá is washed (for he is almost as helpless as the stone image he protects), dressed in his smartest clothes, and his brows adorned with some of the sacred sandal wood. Thus prepared, he sits in state to receive the pilgrims in the small courtyard of his house, when the devotees spread before him their *nazrs* in money and offerings of fruit. The Rájá, having approved the presentation, holds out his right foot to every pilgrim in turn, who, having touched his hand and eyes with it, washes the great toe, and pours the abluent water over his own shoulders. This done, the pilgrim begs the Rájá's blessing upon himself and train, a boon which is granted towards every living thing in the caravan of devotees, the Rájá repeating "*Subh Sáhib, Subh Ghorá*," until every

goat and dog of the procession has received the blessing of fruitfulness. The pilgrims are then permitted to carry away the idol for their private adorations."

The Svetámbara Jains have discontinued this practice since 1866, in consequence of a quarrel with the Rájá of Pálganj. A rich Jain woman of Bombay presented some valuable jewels, which the Svetámbaras wished to keep to decorate the image of Pársvanátha. The Rájá, however, insisted on taking them, arguing that by immemorial custom he, as protector of the pilgrims, was entitled to all offerings. The case ultimately came before the High Court, and it was decided that the Rájá had a right to the articles themselves, but must pay their value, Rs. 800, to the Jains. In consequence of this, a new arrangement has recently been made. The offerings of the last three years were valued, and an average annual amount agreed upon, which for the future the Svetámbara Jains will pay to the Rájá, and will take on behalf of the temple all jewellery that may be presented by pilgrims.

On Madhuban itself and the temples, A. P. writes as follows :— "From the point of view at which the temples first appeared in sight, until I entered the village of Madhuban, which they nearly join, the various turnings in the road gave them in the landscape a position constantly changing and beautiful. As I approached nearer and nearer, a new building seemed to start up at every turn, either from behind a clump of trees, or from the white collection that had seemed to compose one pile; and it was not till I stood by the ditch that encircles them, that I could definitely make out the walls and enclosures dividing off each range of buildings. From this position I counted four separate temples with their handsome *naubat khánás*, gateways and out-houses. The gardens and fine trees that lay between each, and the long walls that enclosed large yards around each *math*, gave the whole the appearance of a beautiful palace; but that the silence of the picturesque scene seemed more in character with a place of holiness. The buildings were almost tenantless, and nothing caught my ear save the melodious notes of the *koel*, and the cries of the paroquets that flew from cupola to cupola and from pinnacle to pinnacle. One fine bush of jasmine (brought originally from Hazáribágh) perfumed the court of the largest temple, and there was on all sides a profusion of those yellow and pink flowers which are commonly offered at every Hindu shrine. I have stood in the principal Siala at Benáres, and in the temple of Vishnu at

Gayá; but I have never seen, and I scarcely suppose that India can contain, a place of consecration whose peace and beauty are so imposing as this.

"The temple, the idol in which bears the oldest date of consecration, although the edifice does not exhibit the greatest signs of age, is a handsome building of brick, freshly *chunamed* and whitewashed every year. It is ornamented with a plain cupola, with four little turrets, with roofs like bells at the corners, and a steeple, from the top of which several little brazen bells blew about and rang in the wind. The centre chamber of this temple contains two idols of Pársvanátha, one of brass, the other of white marble, both of the same form. A Sanskrit inscription at the foot of the images announces the year of their being placed in the shrine. '*Asi' hapit Shuogal Chand* and *Hoshiyal Chand*, Samvat 1825' (A.D. 1768). This is called the *panchayta mandir*, as it is in the charge of, and its repairs are kept up by, the *mahájans* of Murshídábád, heirs of the consecrators. The courtyard is surrounded with roomy galleries for the accommodation of pilgrims.

"Adjoining this temple on the southern side, and more under shelter of the mountain, stands the *mandir*, which, from its appearance, is evidently the oldest of the set; for though the dates engraven on the pedestals of the idols are more modern, the architecture is less ornamental, and the interior of the building more dirty and decayed than any of the others. The appearance of this building may partly be occasioned by want of attention on the part of its distant guardian, but the beams and the walls bore certain marks of age as well as of ill repair. Although possessing no claims to great antiquity, it is without doubt the oldest of the Jain sanctuaries at Madhuban. It contains two handsome images, both of Pársvanátha;—one in black marble, on which is inscribed in Sanskrit letters, '*Asi' hapit Junandhar Bhukan Tirthankara*, Samvat 1871' (A.D. 1814); the other of white marble, with an inscription bearing the name of Hirá Lál of Patná, Samvat 1881 (A.D. 1824). The Jain who placed the former image in this sanctuary, and who calls himself a Tirthankara, lives at Gwálior, and was described to me, by some of the pilgrims of the season, as the head *pandit* of the sect. The temple is called his; and a *chelá*, who resides in the sanctuary on his part, was the only Jain resident at Madhuban. He was, however, extremely ignorant, and could not even assist me in discovering the names of the Tirthankaras to whom the buildings are dedicated on the

peaks of the mountain. As the word *ast' hapit* (installation) clearly relates to the placing of the idols in the several shrines, the actual dates of the buildings cannot be ascertained; but except in the case of this temple, there is no reason to believe that the consecration could have taken place long after the erections were completed.

"The third temple belongs to the Digambara Jains; it is less high and less ornamented than the first I noticed, but it is a handsome building, with a square pediment and cupola preserved perfectly clean and white. It contains two idols:—one of Neminath, the twenty-first of the Tirthankaras; and the other of Pashpadanta, the ninth of the Tirthankaras. The Sanskrit letters on each image announce their consecrator, '*Ast' hapit Rup Chand Jagat Seth*, Samvat 1873' (A.D. 1816); the repairs of the sanctuary are at the expense of Indra Chand Seth, a *mahájan* of Murshídábád.

"A fourth *mandir*, commenced about three years ago, is still (1827) building under the charge of the *panchayat* of Murshídábád merchants, to whom the first temple belongs; and on this work the contributions of pilgrims are bestowed. The new edifice is on a larger scale, and in a more ornamental style of architecture than the rest, and already presents a very beautiful appearance. The body of the building consists of two stories, the upper of which, being smaller than that on which it stands, is surrounded by a broad gallery, with a balustrade and bell turrets at the corners. On the second tier stands the pediment of the cupola, ornamented with arches on the sides, in the same fashion as the lower ranges of buildings. The dome is yet unfinished, and had no steeple when I saw it. The whole edifice stands in the centre of a large square court, on the eastern side of which is a very elegant *naubat khánd*, with an arched gateway below and apartments above. The scarlet *pardahs* hanging before the open gallery of this building, contrasted with the brilliant white colour of its walls, afforded a most rich combination to the eye at a distance. This temple has not yet been consecrated; and although £3200 have been spent upon it, £1000 more are required to finish the work.

"The fashion of these temples is unlike that of any Jain remains in the south or west of Hindustán, of which I have either seen representations or read descriptions. They bear a composite resemblance both to Hindu *maths* and Muhammadan mosques; the *naubat khánás* balustrades, and bell turrets are of the latter style, while the cupolas and arches are the same as are common in Hindu architecture.

"Arrived at Madhuban, the pilgrims attach themselves to whichever temple they prefer, finding accommodation in the apartments round the courts. Those who are desirous of propitiating heaven in favour of deceased friends, carry a *pindah*, or offering of honey, *ghí*, rice, sugar-candy, and the flower *amkhánd*, to the shrine of the Gwálior *mandir*. There are no priests to initiate the pilgrims in the mysteries of their ceremonials. Each, therefore, pursues his own habits of devotion; and their only expenses, after passing through the hands of the spoilers at Pálganj, consist in hiring a *duli* to carry them up the mountain, and in leaving some small contribution for the repairs of the sacred buildings. These repairs are undertaken with the greatest punctuality as soon as the rainy season breaks up; the *panchávat* of the Murshidábád *mahájans* are responsible for the application of the funds, and make whatever additions are necessary. Attention to cleanliness is inculcated by their religious principles, and the beauty it secures to their buildings surpasses everything of the kind that I have seen."

After visiting the summit of the hill, A. P. descended on the south side, passing the large temple which he thus describes:—

"About three-quarters of a mile on the southern descent from the first *math* at which I arrived, and snugly sheltered from the northern and western storms, stands the principal and the most beautiful of all the temples in this neighbourhood. The same observation that I have made regarding the mixture of Musalmán and Hindu architecture in the temples of Madhuban, will apply to this *mandir*, which, as I descended through the thick jungle upon it, looked more like a Muhammadan *dargah*, than a building belonging to the original people of Hindustán. The pediment and body of the temple were ornamented with arched entrances between single pillars, such as are common in the larger houses of the Hindus; but above this, all was in Muhammadan fashion. Five handsome fluted domes, one large one in the centre, surrounded with four small ones, each forming the roof of a corresponding apartment, seemed too heavy a crown for the edifice from which they rose. These domes were well ornamented, and were pointed with those spires composed of golden or brazen balls, and ending in arrow heads, which are generally to be seen shooting out from the tops of minarets. The four sides of the building are alike, but to mark the principal approach, a large *chabutra* lies in front of the eastern archways.

"On entering the centre and holy chamber of this temple, it is impossible to avoid being impressed with the simple beauty of the place. The pavement is composed of fine slabs of blue veined marble; and on a white marble pediment opposite to the entrance, five very beautiful idols of the Jain Tirthankaras sit in dignity waiting for the prayers of their disciples, which are rendered more deep toned by the echoing influence of the dome that forms the ceiling of the sanctuary. The centre figure, which represents Párśvanátha in the same attitude as at Pálganj, is cut out of a beautiful piece of black marble. It measures between three and four feet high, as sitting, and is a remarkably graceful idol, in full preservation. The other four are about two feet and a half high each; all of them of white marble, and one of them wearing the same hood which adorns the head of the central image, as the peculiar ornament of Párśvanátha.

"On the pedestal of each *murat*, the same Sanskrit inscription appears. '*Asṭ hapit Shuogal Chand Jagat Seth*, Samvat 1822' (A.D. 1765). The consecrator is the same as in the first temple at Madhuban, the date of consecration being three years earlier.

"The chamber which constitutes this sanctuary is about 20 feet square, and between 30 and 40 high to the centre of the dome. There are no ornaments beyond those I have described, but the marble pavement, pedestal, and idols are the handsomer for being unadorned. Of the four smaller apartments at the corners, two remain empty, and the other two contain each seventeen idols of all sizes (but all of the Jain form and posture), ranged along a ledge in the wall. These appear to have been left at will by any pilgrims who may have been anxious to consecrate their household gods at the shrine of Párśvanátha."

As to the shrines, known as *gúmtís* or *maths*, A. P. writes:—

"It is held to be necessary that every *gúmtí* or *túk* should be visited, and receive an offering at the hands of each pilgrim; and as many of the peaks are several *kos* distant from the *math* of Kunthpáth, to which the ascending path arrives, and as some of them can only be mounted by climbing, this is indeed a penance of extreme labour and fatigue. But no danger or difficulty will deter these persevering enthusiasts, and rather than return to their houses without having completed this arduous task, they will die in the undertaking; death in such a service being looked upon as the most honourable fortune that can befall a pilgrim. The length and tediousness of this duty is increased by their strict forbearance from committing any

kind of impurity whatever within the holy precints; and as it is their custom only to eat by daylight, to avoid incurring the destruction of the smallest insect, several excursions to the summit are necessary for the accomplishment of the pilgrimage.

"Each *gúmtí* is a solid pile of brickwork, varying in height and size according to the facility its station afforded to the builders. The largest does not exceed eight feet in height, and the same in length and breadth; while some appeared not to be larger than one-fourth of these dimensions. In each of these buildings is a small recess, on the flat of which is marked the print of a foot, revered as the *charan* (or last footmark upon earth) of the Tirthankara, whose name is engraved beneath. Upon every *gúmtí* near the *charan* an inscription certifies the date of its consecration, '*Así hapit Shuogal Chand Jagat Seth, Mágh Sudit Tirotsi*, Samvat 1825'—the 13th day of the second half (or the 28th day) of the month of Mágh, 1825 Sambat (A.D. 1768).

"The visits and salutations to the several *charans* on the peaks are concluded by a more deliberate adoration at the temple of Pársvánatha, which is so admirably situated to encourage those abstract exercises of the mind in which the Jains ordinarily indulge. After concluding the duties on the mountain, those who desire to leave no claim to a sanctified character unadvanced, perform a circuit round the base, starting from Madhuban, to which they again return after traversing a circle of at least thirty miles. From this place the greater part of the pilgrims depart for the other temples at Páwápurí in Behar, and Champapurí near Bhágalpur."

A very beautiful shrine of white marble, supported by two graceful sculptured figures, was recently erected on the highest peak of Párasnáth, in the place of one destroyed by lightning two years ago. This new shrine is said to have cost £8000. It has since met with the same fate as the shrine which preceded it, and is now (1876) lying in fragments round the base of the peak on which it stood.

STATISTICAL ACCOUNT

OF THE

DISTRICT OF LOHÁRDAGÁ

STATISTICAL ACCOUNT

OF

THE DISTRICT OF LOHÁRDAGÁ.[1]

THE DISTRICT OF LOHÁRDAGÁ forms the central and north-western portion of the Chutiá Nágpur Division. It lies be- 1 22° 26′ and 24° 39′ north latitude, and 83° 24′ and 85° 57′ east ude; and contains a total approximate area, as returned by the or-General in 1875, of 12,044 square miles. The population District, according to the Census Report of 1872, is 1,237,123 s. Ránchí, the chief town and Administrative Headquarters, is situated in 23° 22′ north latitude, and 85° 23′ east longitude. The District takes its name from Lohárdagá, a small town forty-five miles

[1] The principal materials from which this Statistical Account is compiled are:—(1) The Five Series of Special Returns furnished by the Deputy-Commissioner; (2) Medical Return, prepared by the Civil Surgeon; (3) Geographical Data, furnished by the Surveyor-General; (4) Chutiá Nágpur Survey Report (1868), by Captain Depree; (5) Palámau Survey Report (1866), by Captain G. H. Thompson; (6) Settlement Report of the Government Farms in Palámau, by Mr Forbes; (7) Dalton's *Ethnology of Bengal* (Culcutta, 1872); (8) Bengal Census Report, 1872, with subsequent District compilation, by Mr C. F. Magrath, C.S.; (9) Report on the Indigenous Agency employed in taking the Census; (10) Annual Reports of the Commissioner of the Chutiá Nágpur Division; (11) Memoirs of Geological Survey; (12) Annual Reports of the Inspector-General of Police; (13) Report on the Forests of Palámau, by Dr W. Schlich, Conservator of Forests; (14) Statistics specially prepared by the Inspector-General of Jails for 1856-57, 1860-61, and 1870, and the Inspector-General's Report for the latter year; (15) Statistics specially prepared by the Director-General of Post-Offices; (16) Statistics compiled from the Reports of the Director of Public Instruction; (17) Report on the Charitable Dispensaries of Bengal for 1872; (18) Report on the Land Tenures of Chutiá Nágpur Proper, by Mr G. K. Webster, C.S., Manager of the Estate, dated 8th April 1875; (19) Report on the Land Tenures of the Palámau Subdivision, by Mr L. R. Forbes, C.S., Assistant Commissioner, dated 2nd February 1876.

west of Ránchí, where the first British officer was stationed on the establishment of the South-West Frontier Agency in 1834.

BOUNDARIES.—The District is bounded on the north by the Districts of Hazáribágh and Gayá; on the north-west and west by the District of Mirzápur in the North-Western Provinces, and the Tributary States of Sargújá and Jashpur; on the south by the Tributary State of Gángpur; and on the south-east and east by the Districts of Singbhúm and Mánbhúm. A portion of the eastern boundary coincides with the course of the Subarnarekhá river, and the western and northern boundaries of the Palámau Subdivision are formed by the rivers Kanhar and Són.

The Revenue, Magisterial, and Civil Jurisdictions are all conterminous.

GENERAL ASPECT.—The District of Lohárdagá comprises two tracts of country which differ essentially in aspect and physical formation—Chutiá Nágpur Proper, and the Subdivision of Palá Chutiá Nágpur Proper, as distinguished from the Commissi Division which bears that name, is an elevated tableland, fo the central and south-eastern portion of Lohárdagá District the west, this plateau rises and stretches away towards Central to meet the Sátpura range. On the north, it is connected with central plateau of Hazáribágh by a narrow neck of high land passing through *parganá* Tori, which separates the headwaters of the Dámodar from those of the Amánat. The surface of the Chutiá Nágpur plateau is undulating, and the staple crop is rice, grown on terraces cut in the slopes of the depressions which lie between the ridges.

Captain G. C. Depree, who conducted the Topographical Survey of 1868, describes Chutiá Nágpur Proper as follows:—"The rocks throughout Chutiá Nágpur are of igneous origin, generally of gneiss formation. They assume fantastic forms, and are often piled one on another in an unaccountable manner, as in the case of the remarkable natural pillar standing a mile to the north of Pálkot; or they take a globular form, rising abruptly from the ground, and looking as if they had exuded from the earth as gigantic bubbles that had become solid instead of bursting. Rocks of this character pervade the whole of the District except the north-west corner. They form the faces and slopes of the elevated plateaux (to be presently spoken of), and of the isolated hills which crop out of the plain. All these isolated peaks conform to regular lines, which run

east and west. An observer stationed on one of these may trace the line as far as the eye can reach, by the sharp peaks rising as they are foreshortened, and looking like the teeth of a shark. Again, in the north-west corner, and along the boundary of Jashpur, are to be seen the peculiar hill features called *páts*. These hills extend westward into Sargújá and Jashpur. They are of a nearly uniform height, 3600 feet above the sea. Looking at them from a distance, their summit is as level and uniform as that of a masonry wall, and they form as perfect an horizon as the sea itself. On a near inspection, however, they are found to consist of rocky spurs of various heights, with deep valleys and many precipitous ravines radiating from the central mass. The ascent of these *páts* is steep. The path winds amongst boulders of rock, or up earthy slopes covered with forest, until 20 or 30 feet from the summit is reached; here a precipitous rock, the edge of a horizontal stratum, bars progress except through some fissure, not seen at first view. This horizontal stratum of trap-rock forms a true contour or level line, being visible like a collar on every side of the *pát*. It in fact gives the *pát* its form; were it not that it continues to resist the action of rainfall, these *páts* would long ago have had their upper soil washed away, and would have put on the form of peaks and ridges common to ordinary hills. On the summits there is generally a small depth of soil overlying the rock, consequently very little can be cultivated; forest trees however grow, and the slopes of the *páts* generally bear heavy timber. It is probable that the *páts* at an early period were one continuous mass, forming a plateau. If this be so, then Chutiá Nágpur was formerly made up of three separate levels of 3600, 2100, and 800 feet respectively above the sea. The second level, upon which Ránchí Station is situated, averages 2100 feet above the sea, and has an area of about 4500 square miles. On the east, the fall to the level of 800 feet coincides with the meridian line of about 85° 45′. On the south, the *ghát*s run east and west in about latitude 22° 45′; and on the north, the plateau abruptly falls to the valley of the Dámodar river, in latitude 23° 30′ on an average. On the west, the high land runs on into the adjoining countries of Sargújá and Jashpur, forming a part of the great Vindyá range. The highest part of the plateau of Chutiá Nágpur, or second level, lies about eight miles south-west of the Station of Ránchí. Here the ground is nearly 2500 feet above the sea, forming the watershed from which rise streams that flow into the Bráhmaní on the south, and

the Subarnarekhá river on the east. The northern edge of the plateau above noticed, again, forms the watersheds of the Dámodar, the Bráhmaní, and the Subarnarekhá rivers. And lastly, from the undulating ground forming *parganá* Tori, streams flowing to the east join the Dámodar, while those to the west fall into the Són. The third level of 800 feet has nothing remarkable attaching to it. It has no abrupt falls, and its principal drainage-line, the Subarnarekhá river, slopes gradually away to the Bay of Bengal.

"There are few countries which present more quiet beauty than Chutiá Nágpur. During the rainy season and cold weather the purple gneiss rocks, contrasting with the green jungle on the near hill-sides, the deep blue of the distant hills, the mango groves with which the country is thickly studded, the rice cultivation, the bright yellow-flowered *surgujiá* crops, and the dark red of the newly turned-up soil, form a variety of colour uncommon and striking. There are few spots where some hill features do not form part of the view; the whole country is undulating; and the scenery on the *ghâts* is picturesque, and as grand as hills of 2000 to 3600 feet elevation ever afford."

The Subdivision of Palámau forms the north-western portion of Lohárdagá District. On the east and south, it consists of spurs thrown off from the plateaux of Hazáribágh and Chutiá Nágpur, while the rest of the Subdivision is a tangled mass of isolated peaks and long irregular stretches of broken hills. The general run of these hill ranges is from east to west, but the relations of the minor ridges are most involved, and the size of the valleys which they form is stated to vary from one to nine hundred square miles. The average elevation of the country is about 1200 feet above sea-level, but some of the higher peaks forming the southern face of the valley of the Aurangá rise to more than 3000 feet. In the eastern and southern portions of the Subdivision the rocks consist of gneiss and various kinds of granite, while many of the western and south-western hills are capped with sandstone and laterite. The contour of the hills is mainly determined by the rocks of which they are composed; those topped by laterite or sandstone have long flattened summits, but the crystalline rocks show an irregular outline broken by sharp ridges and conical peaks. Trap dykes occur frequently, and masses of quartz, hornblende, and felspar are found all over the Subdivision. The face of the country is wilder and more broken by rock and jungle than in Chutiá Nágpur. There are no level

areas of any extent except the valleys of the North Koel and Amánat rivers, to which rice cultivation is confined. Oil-seeds (*til*) and cotton (*kapás*) are the staple crops of the Subdivision.

RIVERS.—The principal rivers in Chutiá Nágpur Proper are the following:—

The SUBARNAREKHÁ rises ten miles south-west of Ránchí, and flows towards the north-east, leaving the main plateau in a picturesque waterfall called Hundrughágh. From this point it forms the boundary with Hazáribágh, its course being eastwards to the triple boundary junction with Mánbhúm District. Hence it bears southwards, and is again the boundary-line until Singbhúm District is reached, after a course of 100 miles. Its main confluents are the Kánchí and Karkari rivers, both of which rise on the central plateau and fall into the Subarnarekhá from the west. The former has a course of 55 miles, and the latter of 78 miles.

THE SOUTH KOEL.—There are two rivers called Koel in Lohárdagá District. The North Koel rises in the Barwá Hills to the west of the District, and after a course of forty miles, enters the Palámau Subdivision, and eventually joins the Són. The South Koel drains the greater part of Chutiá Nágpur Proper. Rising a short distance to the west of Ránchí, it follows a circuitous course southward until it meets the Sankh in the Tributary Mahal of Gángpur; and the united stream, under the name of the Bráhmaní, enters the sea on the north-east of Cattack. The Káru, the Deo, and many minor streams, are the feeders of the South Koel, which has a length of 185 miles from its source in Lohárdagá to its junction with the Sankh in Gángpur. The Sankh rises in the west of the District, and meets the South Koel in Gángpur, after traversing a course of 120 miles.

THE NORTH KOEL.—The chief watersheds of Palámau Subdivision are towards the south, and the drainage passes off uniformly in a north-westerly direction towards the river Són. The most important stream is the North Koel, which rises in the Barwá Hills in Chutiá Nágpur, and passing through the centre of Palámau, falls into the Són about twenty miles above Dehrí. Throughout a large part of its course the bed of the North Koel is rocky; and even if the worst obstacle—a ridge of gneiss rock crossing the river near the village of Sigsigi—could be removed, the sudden freshes which take place during the rains would render navigation extremely dangerous. The chief feeder of the North Koel is the Amánat, which takes its rise in the hilly *parganá* of Kundá in Hazáribágh District. It

meets the North Koel from the east; and the richest and most thickly-populated portion of Palámau is the undulating plain to the north formed by the junction of these two rivers—the Amánat from the east, and the Koel from the south. The bed of the North Koel is rocky up to the point of junction, but that of the Amánat and of the united stream is entirely composed of sand. Near the centre of the Subdivision the two valleys coalesce into one, which extends to the river Són. The average width of the valleys is about eight miles, and they are flanked on either side by ranges of hills lying about fifteen miles apart. The river Aurangá rises in Chutiá Nágpur, and, after a course of about fifty miles, joins the North Koel fourteen miles south of Daltonganj. The Aurangá is a rocky and picturesque stream, and its valley forms an area of richly productive soil in the south-east portion of Palámau. Cultivation, however, is sparse, owing to the thinness of the population. The Kanhar river is a large mountain torrent which rises below the western face of the Jamirá *pát*, in the Tributary Mahal of Sargújá. For a considerable distance it runs parallel with the North Koel, marking the western boundary of Palámau, and eventually falls into the Són in the District of Mirzápur some way to the west of the former river. The bed of the Kanhar is rocky throughout its course, and the valley does not afford a cultivated area of any importance.

HILL SYSTEM.—The characteristic features of the hill system of Lohárdagá have already been described in the section on the General Aspect of the District. As far as Chutiá Nágpur Proper is concerned, it is hardly possible to add anything to what has been said above. That part of the District contains, indeed, several ranges of hills, but the natives do not assign any common name to a range. Each peak has its special name for those who live close by, and is known to persons from a distance by the name of the village which lies at its foot. The highest hill in Chutiá Nágpur is Sáru, 3615 feet, in *parganá* Kasmár, west of Ránchí. Bárágáj, or Marang Buru, north of Ránchí, is 3445 feet above sea-level.

One of the most prominent features of the hill system of Palámau is the Chechári valley, which occupies the south-west corner of the Subdivision. This valley is a complete basin, with only one outlet to the north, through which a small stream takes off the drainage of the high lands into the river Koel. On the south it is overlooked by the range of hills in *parganá* Barwá; on the west the Jamirá *pát*, a high plateau in the Tributary Mahal of

Sargújá, rises like a wall to a height of nearly 4000 feet, confronted on the eastern side of the valley by the Nethurhát *pát* of 3600 feet; while a lofty spur from the Jamirá *pát*, crowned by the natural fortress of Támolegarh, overhangs the valley to the north. The summit of the Nethurhát *pát* is an undulating tableland about four miles long and two and a half miles broad. A small stream runs through the centre of the plateau. The climate of the Nethurhát is cool throughout the year, the summit is free from clouds and mist, and the place is stated to be well suited for a sanitarium. The other most conspicuous peaks of Palámau are—Bulbul, on the south-east boundary, 3329 feet; Burí, on the south-west boundary, 3078 feet; Kotám, 2791 feet; Kumándi, 2530 feet; Tungari, 2108 feet.

Throughout the entire District the hills are, as a rule, covered with tree jungle, or a scrubby undergrowth, consisting of wild plum (Zizyphus jujuba) and stunted *palás* (Butea frondosa).

River Banks, &c.—The banks of the rivers throughout the District are usually steep and covered with jungle. No attempts have been made to bring them under cultivation. Most of the river-beds are rocky, and there are no important instances of alluvion or diluvion.

Lakes, Marshes, &c.—The District of Lohárdagá contains no natural lakes, and no marshes that remain wet throughout the year. To the west of the town of Ránchí an artificial lake has been made, which covers about forty-eight acres of ground. There are no canals or artificial watercourses in the District.

Description of Boats.—The only boats used in the District are the hollowed-out trunks of trees. Boats of more elaborate construction have been tried on the lower reaches of the Koel river, where the bed is broad and sandy, and the fall comparatively slight. But owing to the sudden freshes which are caused by heavy rain in the south, the experiment proved a failure.

Loss of Life by Drowning.—The Deputy Commissioner reports that in the five years ending 1869, the average annual loss of life from drowning was seventy-four persons. This, however, is only the number reported to the police. The real loss of life from this cause was probably much greater.

Communities Living by River Traffic.—There are no villages in the District with a community living solely or chiefly by water traffic. Nor is there any regular trade on the rivers; but during the rains, bamboos are floated down some of the larger rivers in Palámau, for sale on the banks of the Són. This trade is chiefly carried on by

merchants of Sháhábád and Patná, whose agents are employed in woodcutting in the forest of Palámau during six months of the year. The proprietors of the jungles charge a royalty of Rs. 2 (4s.) per axe, without reference to the amount of timber felled. Each raft that is floated down generally contains from sixty to seventy thousand bamboos, and the cost per thousand, by the time they reach their destination, is said to be Rs. 5 (10s.)

Utilisation of the Water Supply.—Water is stored for the purpose of irrigation, by constructing small embankments across the upper ends of the trough-like depressions which make up the face of the country. Such embankments, it is estimated, repay the cost of their construction within three years' time, by the rent of the land which is brought under cultivation by their means. But even this simple mode of irrigation is not largely resorted to, and the crops are usually left to depend on the natural rainfall of the District. Except near large villages where tanks have been dug, drinking-water is obtained from natural springs (*dáris*), which rise perennially in the lower levels. The water of these springs is kept clean by letting into the ground a wooden framework, or the stem of a hollow tree.

Fisheries and Fishing-Towns.—There are no fisheries in the District, nor are there any villages of which the inhabitants make their livelihood by fishing.

Lines of Drainage.—The central portion of Chutiá Nágpur Proper is drained by the South Koel, which is joined by the Sankh, and under the name of the Bráhmaní flows into the Bay of Bengal. The drainage area of the south Koel is 3600 square miles. The Sankh takes the drainage of the western portion of the District, and has a total basin of 1100 square miles. The Subarnarekhá, running in a north-easterly course, drains the eastern portion of Chutiá Nágpur. It has already been pointed out that the drainage system of Palámau is quite distinct from that of Chutiá Nágpur Proper, and runs northwards to meet the Són, while the Chutiá Nágpur rivers bear southwards and fall into the Bay of Bengal. Palámau, then, is drained chiefly by the North Koel and Amánat rivers. The drainage area of the North Koel is estimated at 550 square miles. No data are available to determine the area drained by Amánat, Aurangá, or Kanhar rivers. The latter, however, merely forms the western boundary of the Subdivision, and does not take the drainage of any considerable area. All these rivers have rocky barriers in different parts of their courses; and it is owing to the rocky nature of

the river-beds that the levels of the country have undergone comparatively little alteration from water action. All surface drainage is effected by the rivers, and no water is carried off by gradual percolation through large marshes and swamps.

Hot Springs.—Only one hot spring is known to exist in the District. It oozes from the bed of a small stream in the village of Mundal in *tappá* Bárí, Palámau. The temperature of the water is about 180° Fahrenheit, and the spring is supposed to contain iron.

Waterfalls.—The District of Lohárdagá contains two picturesque waterfalls, known as Hundrughágh and Dásamghágh. The former is situated in *parganá* Jashpur, about twenty-five miles east-north-east of Ránchí, and is caused by the Subarnarekhá river rushing down a rocky chasm, as it passes from the second to the lowest plateau in its course towards the Delta of Bengal. The measured height of the fall is 320 feet, but this does not represent a sheer drop, except in the rains. Dásamghágh waterfall, about twenty-two miles to the south-east of Ránchí, is formed by the Kánchí river falling over a ledge of rock in a perpendicular descent of 114 feet.

Forests.—The entire surface of Lohárdagá District was probably at one time covered with dense forest. No revenue has ever been derived from this source, and the forests have been continually dwindling, owing to the spread of cultivation, and the practice of ringing the *sál* tree for *dhuná* or resin. A zone of bark six inches wide is cut away near the base of the tree, a thin connecting strip being left, through which the sap passes. The resin exudes from the edges of the cut bark, and is collected every rainy season. Although its growth is arrested by this process, the tree lives for a few years, and only dies when the connecting strip of bark is finally severed. In spite of the wholesale destruction of timber that has gone on for many years, the slopes of the great plateaux and the undulating country on the south edge of the District are still covered with forest. In particular, the Fiscal Division of Bírú is described as one vast jungle. No further detailed information is available for Chutiá Nágpur Proper. The Subdivision of Palámau was visited in March 1873 by Dr Schlich, Conservator of Forests, from whose report the following paragraphs are condensed.

The forests of Palámau may be divided into three distinct classes —lower mixed forest, occupying the lower portion of the area up to an elevation of about 1000 feet; *sál* forest; and upper mixed forest, which is found on the upper part of the ranges, and on steep slopes

where rocks appear in large masses on the surface. The *sál* forest appears generally between the two others, occupying the undulating ground down to the level at which the lower mixed forest begins. The characteristic trees of the lower mixed forest are:—*Khayer* (Acacia catechu); *Palás* (Butea frondosa); *Asan* (Terminalia tomentosa); *Baer* (Zizyphus jujuba). In the *sál* forest the proportion of *sál* is so great that all other species are comparatively unimportant. Besides *sál*, the following are the chief characteristic trees:—*Piár* (Buchanania latifolia) and *Belawá* (Semecarpus anacardium). The upper mixed forest contains the greatest number of species, of which the following are the most characteristic:—*Salái* (Boswellia thurifera); *Thauta* (Anogeissus latifolius); *Gambhár* (Gmelina arborea); *Thiu; Kiu* (Diospyros tomentosa); *Gárohau* (Soymida febrifuga); *Guler* (Ficus racemosa); *Ginyán* (Odina wodier); *Kusum* (Schleichera trijuga); *Galga* (Cochlospermum gossypium); *Báns* or bamboo (Bambusa stricta).

Taking the forests as a whole, the following are the trees found in the largest numbers:—*Khayer* (Acacia catechu); *Sál* (Shorea robusta); *Palás* (Butea frondosa); *Salái* (Boswellia thurifera); *Asan* (Terminalia tomentosa); *Mahuá* (Bassia latifolia); *Sidá* (Lagerstræmia parviflora); *Baer* (Zizyphus jujuba); *Beri* (Casearia tomentosa). As timber, *sál* takes the first place, being used for an endless variety of purposes. Next comes *Kusum* (Schleichera trijuga), an extremely hard wood, used for rice-pounders, oil-presses, sugar-cane crushers, &c. *Kiu* (Diospyros tomentosa), a kind of ebony; *Thauta* (Anogeissus latifolius); *Kahuá* (Terminalia glabra); *Asan* (Terminalia tomentosa); *Thiu; Sida* (Lagerstræmia parviflora); *Karam* (Nauclea cordifolia); *Imli* (Tamarindus Indica); *Gambhár* (Gmelina arborea); *Bel* (Ægle marmelos); *Ginyán* (Odina wodier); *Piár* (Buchanania latifolia); *Persár* (Cassia fistula); and *Báns*, or bamboos, are prized above others for domestic purposes.

Three different kinds of timber are exported from Palámau. Large *sál* timber is transported from the forests around Barásaud, partly by land, and partly by water, down the Koel to Dehrí, for the Són Canal Works; secondly, small timber averaging in girth 2 feet, and in length 12 to 15 feet, and bamboos, are carried from the range on the north-east fár in Gayá District; thirdly, very large quantities of bamboos are cut in the forests around Barásaud, and transported down the Koel to Sháhábád, Patná, and Gayá Districts. The quantities exported per year are not known.

The *mahuá* (Bassia latifolia) is found in large numbers all over the District, and enormous quantities of the flowers are collected for food and for the preparation of spirit. *Ber* (Zizyphus jujuba) is also found over extensive areas, and its fruit is also collected for food. Catechu is extracted from the wood of the *khayer* (Acacia catechu). The amount prepared annually is estimated at 3500 *maunds*. *Dhuná*, or resin, is collected from the *sál* tree, for which purpose the largest trees are killed. The amount of resin collected per annum is supposed to be some 300 *maunds*. No revenue is derived from this source.

The lower mixed forest contains no middle-sized or large trees whatsoever, except those preserved for the fruit's sake, as, for instance, *mahuá*, and here and there a few useless as timber. This condition has been brought about by cutting ordinary timber-trees for local use and for export, cutting *khayer* for the fabrication of catechu, and by the practice known as *júm* cultivation. For this latter purpose large areas are cut every year, as soon as the shoots or trees are a few years old. In most cases the jungle of a large tract is collected on a comparatively small spot, which is cultivated after the wood has been burnt. In this manner the jungle of from 5 to 10 acres is cut for the purpose of cultivating one acre of land. In the upper mixed forest, large and mature timber is still found in the more remote tracts. Near the lines of communication, and along the border of Gayá District, very little or no large timber is found, except such as is useless. In some parts the *júm* system of nomadic cultivation prevails, but the areas fit for it are limited. All the more accessible *sál* forests have been worked out some time ago, and they contain now hardly anything but shoots from old stumps, of a girth up to 1½ or 2 feet at the utmost. Seedlings are extremely rare, simply owing to the fact that there are no seed-giving trees. Some less accessible *sál* forests, chiefly in the vicinity of Barásaud, still contain a little mature timber, but very few living large trees. Dead trees of considerable girth are more frequent; and from a spot between Garu and Sirju, Dr Schlich counted 130 large dead *sál* trees within a circle of about half a mile. These trees had almost all been killed for the sake of the resin, to obtain which they were girdled. From inquiries, it appears that the value of the resin obtainable from a full-grown *sál* tree is about half an *ánná*; and for such a trifle from 50 to 100 cubic feet of timber are sacrificed. After another few years there will not be a single large *sál*

tree found alive, and natural reproduction will be completely stopped for want of seed. *Júm* tillage is carried on to a considerable extent in *sál* forests, and some of the old trees have been killed by the cultivators' fires. A portion of the old timber has been removed for the Són Canal Works; it is carted some 20 to 25 miles along a rough and difficult road, or rather track, to the junction of the Koel and Aurangá, whence it is floated to the Són. The timber now lying on the banks of the Koel is all unsound, almost all the pieces being hollow, or at least diseased in the centre. Dr Schlich observed that a large proportion of the timber exported for the Són Canal Works was unsound, and attributes this circumstance to excessive jungle fires during the infancy of the trees, and excessive tapping for resin. Young trees, or shoots from old stumps, are cut in large numbers for domestic purposes, including firewood; in fact, in some parts the people burn nothing but young shoots of *sál*, of which they keep a good supply near their houses. In Dr Schlich's opinion, there is no doubt that excellent *sál* forests can be produced by protecting certain areas against cutting and fires. If this is done, seedlings will spring up as soon as seed becomes available, and in the meantime fair-sized timber will be produced from the shoots of the old stumps. Twenty-eight blocks of land in the Palámau Subdivision, comprising a total area of 113,995 acres, or 178·12 square miles, have been set aside for forest purposes. These tracts are all situated in the southern half of Palámau, that is to say, in the *sál* districts. These Government forest-reserves contain the three different classes of forest described above, and, as far as Dr Schlich saw, in the same reduced condition. At present only a small portion of the total area of the *parganá* is under cultivation, but a steady tide of immigration has set in, and tillage is rapidly extending. Dr Schlich recommends, therefore, that the forest blocks be brought under regular management, and estimates that proper supervision and protection will secure at the outset a yearly return of at least Rs. 3600 (£360).

Jungle Products.—The chief jungle products of Chutiá Nágpur Proper are returned by the Deputy Commissioner as follow:—(1) The corollas of the *mahuá* tree (Bassia latifolia), which the poorest classes eat, and from which an intoxicating spirit is distilled; (2) The seeds of the *sál* tree (Shorea robusta), which are roasted, and either mixed with *mahuá* flowers or eaten alone; (3) The berry of the *jámun* tree (Eugenia jambolana), used for food; (4)

The bean of the *karanj* tree; (5) Lac, found on the twigs of the *kusúm* (Schleichera trijuga) and the *palás* (Butea frondosa); (6) *Tasar* silkworm (Antherea paphia); (7) Catechu; (8) Resin; (9) Honey; (10) Arrowroot. It is probable, however, that most of the edible jungle products enumerated in the Statistical Account of Hazáribágh, *ante* pp. 47–55, are also found throughout Lohárdagá District.

The following notice of the forest and jungle products of Palámau is condensed from Mr Forbes' Settlement Report.

The most important of all the indigenous jungle products is the flower of the *mahuá* tree, as the abundance or deficiency of this crop affects the market-price of all other food throughout the year. The total number of *mahuá* trees in Palámau from which fruit was regularly gathered was estimated by Mr Forbes in 1869 at 113,885, of which 18,492 belonged to Government farms, and were specially dealt with at the time of the Settlement. All were of indigenous growth, and it appears not to be the practice to rear trees artificially. The part of the *mahuá* which is eaten is the corolla of the flower, a fleshy blossom of a pale-yellow colour. Mr Ball, in his paper on the edible jungle products of Mánbhúm and Hazáribágh, says that when fresh it has a peculiar luscious taste, with an odour somewhat suggestive of mice, and that when dried it has some resemblance to the inferior kinds of figs. The blossoms spring from the ends of the smaller branches of the tree, in bunches of from twenty to thirty, and, as they approach ripeness, swell with secreted juices and fall to the ground. Much depends on the weather while the flowers are developing; the crop requires sun, and cloudy weather and thunderstorms are most destructive. As soon as the buds appear, the ground is carefully cleared beneath the tree, and sometimes a rough fence of thorns is put up to keep cattle from eating the flowers. On the first fall of the blossoms, the women and children commence the work of collecting. Those who own trees near home, return at intervals during the day with what they have gathered; but where the trees are at a distance, the whole family will encamp close by till they have got in the entire crop. *Mahuá* blossoms are rarely eaten fresh, but are dried on a smooth floor of cow-dung and mud until they shrivel to a quarter of their original size, and take a light-brown colour, so as to resemble raisins. They are usually prepared by boiling. This takes all the flavour out of the flower, and it is therefore eaten with the seeds of the *sál* tree, called *sarráyi*, or some acid leaves or herbs,

to give it a relish. Those who can afford to do so eat *mahuá* fried in *ghí* or butter. The yield of a *mahuá* tree varies very much in different seasons. A large tree will bear in a good season from 4 *maunds* 2 *sers* to 4 *maunds* 29 *sers* of ripe blossom; but the average yield is about 2 *maunds* 28 *sers*, which when dry does not weigh more than 1 *maund* 14 *sers*. Of late years the price of *mahuá* blossom has risen. It used to sell at three *maunds* for the rupee, but at the present market value about a rupee and a half is paid for two *maunds*. During the distress of 1869, the price rose to fourteen, and even eleven *sers* per rupee. The fruit of the *mahuá* tree begins to form immediately after the fall of the blossoms, and ripens in June. The weight of the yield of fruit generally equals that of the crop of blossom. Natives never gather the fruit, nor even shake the tree to make it fall, the belief being, that if this were done the tree would not bear in the following year. When ripe, the *mahuá* fruit is about as big as a peach, and is made up of three separate envelopes with a white nut or kernel inside. The two outer skins are either eaten raw or cooked as a vegetable, and the inner coating is dried and ground up into a kind of meal. Of the kernel itself an oil is made; four *sers* of kernels making one *ser* of oil, which is largely used both for cooking and for adulterating *ghí*. Before, however, it can be used for the latter purpose, it must be clarified with buttermilk, to prevent its offensive smell from being detected in the *ghí*. The oil sells at nine *sers* for the rupee. The amount annually made is small, and it can rarely be purchased two months after the manufacturing season is over.

Baer (Zizyphus jujuba), or wild plum, grows in small thorny bushes all over the surface of the country. Its fruit is very generally eaten in a half-ripe state. When fully ripe, it is gathered, dried, and stored, and either boiled or eaten raw. *Piár* (Buchanania latifolia) grows freely in all parts of Palámau. It bears a small black fruit something like a sloe. The fruit is gathered and dried in the same way as that of the *baer*. The two small stones inside the fruit are called *chirunji*, and are made into a delicate sweetmeat, which sells at three *sers* for the rupee. When eaten raw the fruit is considered unwholesome, and even dangerous if taken during the cholera season.

With the exception of *mahuá* blossom, there are only two jungle products in Palámau which are known to yield an intoxicating liquor—*khasuná* and *khulu*. The former is the bean of a creeper, which bears clusters of pods covered with a velvety fur of a rich

brown colour, which if handled causes great irritation. This bean is cooked as a vegetable by soaking it two or three times in water, which extracts the intoxicating spirit. If soaked merely to obtain the spirit, a smaller proportion of water is used. *Khulu* is the root of a creeper, and the spirit which it yields is extracted in the same way as the spirit obtained from *khasuná*.

The following list of the Palámau jungle products, arranged in alphabetical order, is taken from Table XI. in the Appendix to Mr Forbes's Report:—Fruits—(1) *Ám*; (2) *ámrá*; (3) *ámrukh*; (4) *baer*; (5) *bághnupi*; (6) *barhar*; (7) *bel*; (8) *berainí*; (9) *bir*; (10) *dhelá*; (11) *dithor*; (12) *gambhár*; (13) *gular*; (14) *gurkhand*; (15) *imli*; (16) *jámun*; (17) *kanaud*; (18) *katái*; (19) *kathár*; (20) *keksá*; (21) *khejur*; (22) *khupri*; (23) *mahuá*; (24) *pánkar*; (25) *piár*; (26) *pindár*; (27) *pipal*; (28) *rám charná*; (29) *sarái*; (30) *sikat*; (31) *tár*; and (32) *tend*. Herbs (*ság*)—(1) *Amti*; (2) *banbut*; (3) *bathuá*; (4) *bunt*; (5) *chakwar*; (6) *chianti*; (7) *dháin*; (8) *dhakní*; (9) *gadahporwá*; (10) *gendhári*; (11) *gumáh*; (12) *hansuá*; (13) *harchikár*; (14) *hurhur*; (15) *karam mongar*; (16) *kená*; (17) *kharpati*; (18) *khartuá*; (19) *khesárí*; (20) *konár*; (21) *nauiá*; (22) *pudiná*; (23) *pálki*; (24) *patdhámin*; (25) *sarhanchi*; (26) *sarsun*; (27) *sunsuniá*; and (28) *thengamá*. Roots—(1) *Bankapási*; (2) *berainí*; (3) *charkákandá*; (4) *durá*; (5) *genthi*; (6) *kháiná*; (7) *khejur*; (8) *khasuná*; and (9) *khulu*. Intoxicating liquor is made from the last two. Dyes—(1) *Achh*; (2) *bakkam*; (3) *khayer, kath*; (4) *barre*; (5) *kosum*; (6) *singarhár*; and (7) *tun*. The first three of these dyes are wood, and the rest flowers.

PASTURAGE GROUNDS.—Throughout the Palámau Subdivision the quantity of cleared and cultivated land in each village bears a very small proportion to the uncleared waste; and the south and south-west portions of the Subdivision form, in fact, one vast grazing-ground. A considerable number of cattle are bred on the spot, and during the dry months of the year large herds are driven in to graze from the neighbouring Districts of Gayá and Sháhábád. Since 1870, grazing-dues have been levied by Government in the twenty-eight blocks of waste land set apart as forest reserves. By the old custom of the *parganá*, no dues were charged for cows or bullocks, but two *ánnás* per head and two *chhatáks* of *ghí* were levied for grazing buffaloes. The Government rules follow this custom in exempting bullocks and cows; but every *ahír* or herdsman is required to provide himself with a license to graze a stated

number of buffaloes at three *ánnás* per head, the *ghí* being thus commuted into a money payment. Each license is issued for one year, and an *ahír* who is found with cattle in excess of the number stated in his pass is charged at double rates. The revenue derived from the grazing-dues of the Subdivision in 1870 amounted to Rs.150 (£15).

FERÆ NATURÆ.—The large sorts of game met with in the District are the tiger, leopard, bear, wild boar, wolf, hyena, antelope, spotted deer, ravine deer, *sámbhar*, and *nilgái*. A few bison are to be found in the south of Palámau, and packs of wild dogs are occasionally seen in the northern and western parts of that *parganá*. The small game comprise hares, quail, snipe, grey partridge, duck, teal, ortolan, plover, and pigeon. In Palámau are found, in addition to these, pea-fowl, jungle-fowl, black partridge, florican, curlew, siren, and heron. The superior sorts of fish are the *mahásir*, several kinds of trout, the *ruhi*, *kátlá*, *putiá*, *garai*, *chalhawá*, &c. During the five years ending 1869, the following rewards were paid by Government for the destruction of wild animals:—In 1865, Rs.504 (£50, 8s.); in 1866, Rs.654 (£65, 8s.); in 1867, Rs.1620 (£162); in 1868, Rs.8325 (£832, 10s.); in 1869, Rs.7652 (£765, 4s.). The great increase in the amounts paid in the three later years is due to the fact that the scale of rewards was very considerably raised in the middle of 1867. No rewards have ever been given for killing snakes, though the loss of life caused by them is greater than that from wild beasts. For the five years ending 1869, an average of thirty-eight persons a year were killed by wild beasts, and forty-eight by snake-bites. There is no regular trade in wild beasts' skins; but the skins of *sámbhar* deer are sent out of the District in considerable numbers, and there is a trifling trade in stag-horns. Monkey-skins, also, are used to cover musical instruments.

POPULATION.—The first attempt at an enumeration of the people appears to have been made by Captain Depree, at the time of the Topographical Survey of Chutiá Nágpur Proper in 1868. One hundred and twenty-eight houses in different villages, belonging to men of different castes, were taken at random; and the total number of inmates was found to be 811, yielding an average of 6·34 persons per house. The number of houses, ascertained by the Survey to be 139,116, was then multiplied by the factor thus obtained, and a total population of 881,995 souls was arrived at for Chutiá Nágpur Proper, exclusive of *parganás* Tori and Palámau.

Taking the area of the portion surveyed by Captain Depree at 7120 square miles, the foregoing figures disclosed an average of 123·9 inhabitants to the square mile. It was assumed that this average would apply equally to the Subdivision of Palámau and to *parganá* Tori; and by including these areas in the calculation, a total population of 1,412,956 souls was arrived at for the entire District of Lohárdagá, then containing an area of 11,404 square miles.

In the course of the year 1869 an experimental Census was taken by the Deputy Commissioner, and the population was returned at 1,396,471 persons, or 16,485 less than Captain Depree's estimate. This Census was taken by the village watchmen (*chaukídárs*), those who could not read or write getting assistance from the neighbouring landholders. The returns were sent in to the several police stations, and were eventually compiled in the District Superintendent's office.

Census of 1872.—A careful Census of the District was taken, by authority of Government, during the cold season of 1871-72. Owing to the sparseness and ignorance of the population, no attempt was made in any District of the Chutiá Nágpur Division to effect a simultaneous Census, but a gradual enumeration of the people was made by a special salaried agency. For the sake of economy, the work of supervision was intrusted to the regular police. The District was divided into fifty-nine circles, and each enumerator was furnished by the police with a list of the villages contained within his circle. There was at first some difficulty in the preparation of these lists. Lohárdagá has only been surveyed topographically; and, owing mainly to differences of spelling, it was found almost impossible to reconcile the police lists of villages with the map. The Deputy Commissioner, however, reports that the lists ultimately sent out proved to be fairly correct. Some few villages were found to have been omitted, and these were added by the enumerators. Concerning the unofficial agents who took part in the work, the Deputy Commissioner remarks:—"There is no indigenous agency of any kind in Lohárdagá save that of the village watchmen (*chaukídárs*) and messengers (*goráits*); and these were made use of as far as practicable. No landholders made themselves conspicuous by rendering any special assistance in the Census, but that was not to be expected in this District. There were, however, no complaints against any of them, and they always

deputed an agent to render assistance when called upon. The assistance thus afforded was generally given by the *munda* or *páhn* of the village, and, when required, by a *tahsíldár* or other servant of the landholder, who accompanied the enumerator in going his round of the village." As to the accuracy of the results obtained, Mr Oliphant states:—"On the whole, I think the Census may be said to have been taken as accurately as possible under the circumstances. Every precaution was taken with regard to travellers, a ticket being given to each by the enumerator who counted him, to prevent his being entered twice over. Mr Forbes, the subdivisional officer at Palámau, states that some difficulty was at first experienced in getting at the jungle tribes who squat over the hills. In one case, having reason to believe that one of the enumerators had not been successful in his attempt to count some of them, he deputed another person specially to inquire and ascertain, but the result showed that his apprehensions were quite unfounded."

The results of the Census disclosed a total population in Lohárdagá District of 1,237,123 souls, inhabiting 240,843 houses, the average density of the population being 103 souls to the square mile. The table on the opposite page illustrates the distribution of the population in each Police Circle (*thánd*) and Subdivision. The table is reproduced as it stands in the Census Report of 1872. The Subdivisional figures will be again presented on a subsequent page, when the Administrative Divisions of the District are treated of (p. 482), but they may here be exhibited as a whole.

Population according to Sex and Age.—The number of males is 621,548, and of females 615,575; the proportion of males in the total population being 50·2 per cent. Classified according to age, the Census gives the following result:—Hindus—under twelve years of age, males 161,289, females 131,228, total 292,517, or 39·42 per cent.; above twelve years of age, males 213,582, and females 235,853, total 449,435, or 60·58 per cent. of the total Hindu population. Muhammadans—under twelve years of age, males 12,487, and females 10,092, total 22,579, or 38·79 per cent.; above twelve years, males 16,724, and females 18,908, total 35,632, or 61·21 per cent. of the total Muhammadan population. Christians—under twelve years of age, males 3152, and females 2601, total 5753, or 45·01 per cent.; above twelve years, males 3375, and females 3653,

[*Sentence continued on page 250.*]

Subdivision.	Police Circle (*Thánd*).	Area in square miles.	Number of villages, *mauzás*, or townships.	Number of Houses.	Total Population.	Averages calculated by Census Officers.				
						Persons per square mile.	Villages, *mauzás*, or townships per square mile.	Persons per village, *mauzá*, or township.	Houses per square mile.	Persons per house.
Sadr, or Headquarters.	Bálumat	664	267	10,709	54,078	81	·40	203	16	5·1
	Barwe	7120	258	7,804	32,837	115	·50	127	23	4·2
	Bassiá		279	10,195	62,226			223		6·1
	Biru		153	8,334	38,782			253		4·7
	Choriá		198	8,614	50,648			256		5·9
	Korambe		309	15,552	70,479			228		4·5
	Lodhmá		316	11,931	63,607			201		5·3
	Lohárdagá		385	18,778	93,261			242		5·0
	Pálkot		340	17,295	79,999			235		4·6
	Ránchí		365	21,061	116,426			319		5·5
	Silli		193	10,967	54,524			283		5·0
	Tamár		366	13,983	75,077			205		5·4
	Torpá		390	16,901	78,660			202		4·7
	Subdivisional total	7,784	3,819	172,124	870,604	112	·49	228	22	5·1
Palámau	Bareswar	308	86	3,017	12,334	40	·28	143	10	4·1
	Chattarpur	430	289	5,350	27,196	63	·67	94	12	5·1
	Daltonganj	424	312	9,863	53,976	127	·74	173	23	5·5
	Garwá	663	369	10,710	59,212	89	·56	160	16	5·5
	Munká	563	322	6,758	33,222	59	·57	103	12	4·9
	Majhiwán	654	505	14,893	78,336	119	·77	155	23	5·3
	Patun	490	434	10,202	59,961	122	·89	138	21	5·9
	Rámkunda	728	350	7,926	42,282	58	·48	121	11	5·3
	Subdivisional total	4,260	2,667	68,719	366,519	86	·62	137	16	5·3
	District Total,	12,044	6,486	240,843	1,237,123	103	·54	191	20	5·1

[Sentence continued from page 248.]

total 7028, or 54·99 per cent. of the total Christian population Other denominations not separately classified—under twelve years of age, males 97,008, and females 81,443, total 178,451, or 42·07 per cent.; above twelve years, males 113,931, and females 131,797, total 245,728, or 57·93 per cent. of total "Other" population. Total population of all religions—under twelve years of age, males 273,936, and females 225,364, total 499,300, or 40·36 per cent.; above twelve years, males 347,612, and females 390,211, total 737,823, or 59·64 per cent. of the total District population. It deserves notice that the proportion of children is abnormally large, being 40·4 per cent. in the total population. This is said to be due to the fact that the aboriginal races are unusually prolific; and the returns of the Chutiá Nágpur Division and of the District of the Santál Parganás certainly display a proportion of children to the total population, bearing a direct ratio to the relative strength of the aboriginal element. Thus, in the Santál Parganás, where the aboriginal races are most numerous, the children under twelve form as much as 40·7 per cent. of the population—a proportion which rises even to 47·5 per cent. in the Santál villages of that portion of the Dáman-i-Koh which is situated in Rájmahal. Conversely in the Districts of Hazáribágh and Mánbhúm, which are largely peopled the one by Hindustání and the other by Bengalí immigrants, the proportionate number of children falls to 36·4 and 37·1 per cent. respectively; while among the more aboriginal Districts we find a percentage of 40·0 ruling in the District of Singbhúm, and 40·4 in that of Lohárdagá and in the Tributary Mahals of Chutiá Nágpur. As in other Districts of Bengal, the Census returns disclose a very small proportion of girls to boys, whilst in the population above twelve years of age the females are considerably in excess of the males. This discrepancy probably arises from the fact that natives consider girls have attained womanhood at a much earlier age than boys attain manhood. The percentages of children not exceeding twelve years of age, of all religions, are given in the Census thus:—Hindus—proportion of males 21·7, and of females 17·7 per cent.; proportion of children of both sexes, 39·4 per cent. of the total Hindu population. Muhammadans—proportion of males 21·5, and of females 17·3 per cent.; proportion of children of both sexes, 38·8 per cent. of the total Muhammadan population. Christians—proportion of males 24·7, and of females 20·4 per cent.; proportion of children

of both sexes, 45·1 per cent. of the total Christian population. "Others"—proportion of males 22·9, and of females 19·2 per cent.; proportion of children of both sexes, 42·1 per cent. of the total "Others" population. Total population of all religions—proportion of males 22·2, and of females 18·2 per cent.; proportion of children of both sexes, 40·4 per cent. of the total District population. The total number of insanes and persons otherwise afflicted with infirmities, in Lohárdagá District, is returned in the Census Report at 1655. Particulars of the various kinds of infirmity are not given.

Occupations of the People.—The details showing the occupations of the people, given in the District Census Compilation, are omitted, as they do not stand the test of statistical criticism.

Ethnical Division of the People.—The Hindus and aboriginal races form the great mass of the population. The following tabular classification of the people, according to an ethnological arrangement, is taken from Mr C. F. Magrath's District Census Compilation. The list of Hindu castes will be reproduced on a subsequent page, but arranged on a different principle from that given here, and according to the rank which they hold in local public esteem.

Name of Nationality, Tribe, or Caste.	No.
I.—Non-Asiatics.	
European.	
English,	51
Irish,	6
Scotch,	12
German,	17
Danish,	5
Total,	91
II.—Mixed Races.	
Eurasian,	3
III.—Asiatics.	
Natives of India and British Burmah.	
1.—*Aboriginal Tribes.*	
Asur,	897
Bhar,	1,046
Bhuihar,	940
Binjwar,	2,665
Birhor,	227
Chero,	9,756
Jhorá Gond,	1,338
Kharriá,	21,019
Kol,	132,104
Korwa,	5,214
Munda,	163,051
Nágeswar,	4,200
Naik,	371
Nat,	41
Paháriyá,	35
Parheyá,	2,965
Purán,	3,375
Rautiá,	16,387
Santál,	1,204
Uráon,	151,810
Total,	518,645
2.—*Semi-Hinduised Aboriginals.*	
Bágdí,	532
Banjárá,	58
Bárí,	92

Báuri,	67
Bediyá,	3,540
Bhuiyá,	45,008
Bind,	236
Chamár,	18,966
Chandál,	217
Chik,	12,387
Dom,	5,395
Turí,	4,551
Dosádh,	25,233
Ghásí,	15,700
Ghátwál,	145
Hárí,	200
Káorá,	1,981
Karangá,	36
Khairá,	8,488
Kharwár,	33,573
Bhogtá,	33,452
Ganjhu,	383
Mahat,	19
Mánjhi,	98
Mahilí,	8,999
Mál,	950
Mihtar,	321
Musáhar,	54
Pásí,	1,103
Rajwár,	3,359
Shikárí,	30
Total,	225,173

3.—*Hindus.*

(i.)—Superior Castes.

Bráhman	27,326
Khandáit,	322
Rájput,	37,744
Bandáwat,	8
Total,	65,400

(ii.)—Intermediate Castes.

Bábhan,	5,786
Baidya,	729
Bhát,	1,334
Káyasth,	4,061
Doglá,	141
Total,	12,051

(iii.)—Trading Castes.

Agarwálá,	977
Baniá,	1,725
Barnawar,	51
Dhusár,	1,104
Gandhabanik,	5,035
Jamanpurí,	37
Jaswar,	335
Kasarwání,	322
Kasandhán,	198
Khatrí,	113
Lohandia,	66
Máhurí,	2
Márwárí,	33
Nuniyar,	2,729
Rástogí,	12
Sinduriá,	275
Subarnabanik,	2,736
Total,	15,750

(iv.)—Pastoral Castes.

Garerí,	3,124
Goálá,	20,794
Ahir,	39,340
Mahákul,	299
Total,	63,557

(v.)—Castes engaged in preparing Cooked Food.

Gonr,	3,513
Halwái,	2,995
Kándu,	5,056
Total,	11,564

(vi.)—Agricultural Castes.

Agurí,	1,678
Baráik	4,034
Báruí,	3,183
Támbulí,	1,233
Chásá Dhobá,	74
Kaibartta,	584
Koerí,	20,198
Kurmí,	35,688
Málí,	5,205
Páik,	1,397

Panda,	5,478
Sadgop,	69
Sárak,	1,659
Sakiár,	16
Total,	80,496

(vii.)—Castes engaged chiefly in Personal Service.

Behárá,	157
Dhanuk,	2,107
Dháwá,	37
Dhobí,	8,612
Hajjám or Nápit,	11,739
Káhár,	22,526
Total,	45,178

(viii.)—Artisan Castes.

Barhai (carpenter),	6,366
Bháskar (stone-cutter),	18
Chitrakar (painter),	60
Darzí (tailor),	4
Kámár (blacksmith),	30,515
Gojiá (ditto),	1,481
Kánsárí (brazier),	2,068
Kumbhár (potter),	15,589
Láheri (lacworker),	489
Sánkhárí (shell-cutter),	153
Sikalgir (cutler),	11
Sonár (goldsmith),	3,302
Sunrí (distiller),	9,984
Telí (oilman),	24,427
Total,	94,467

(ix.)—Weaver Castes.

Dhuniá,	137
Jugí,	540
Kapálí,	174
Kashtá,	397
Patuá,	2,079
Durihará,	733
Tántí,	5,837
Total,	9,897

(x.)—Labouring Castes.

Beldár,	828
Kakherí,	118
Nuniyá,	2,635
Total,	3,581

(xi.)—Castes engaged in selling Fish and Vegetables.

Khátik,	26
Porit,	129
Total,	155

(xii.)—Boating and Fishing Castes.

Bathuá,	16
Jáliá,	99
Keut,	678
Málá,	7,250
Pátní,	16
Pod,	271
Tior,	761
Total,	9,091

(xiii.)—Dancer, Musician, Beggar, and Vagabond Castes.

Báiti,	163
Bájaniá,	67
Gandharb,	15
Gulguliá,	4
Pawariá,	32
Total,	281

(xiv.)—Persons enumerated by Nationality only.

Hindustání,	18
Madrásí,	22
Panjábí,	1
Uriyá,	4
Total,	45

(xv.)—Persons of Unknown or Unspecified Castes, .	1,426
Grand Total of Hindus,	412,939

4.—Persons of Hindu origin not recognising Caste.

Atith, ...	85
Vaishnav, ...	4,459
Gosáin, ...	509
Fakír, ...	222
Jogí, ...	56
Nánakshálú, ...	55
Sanyásí, ...	3,929
Sutrashálú, ...	59
Native Christians, . .	12,687
Total, .	22,061

5.—Muhammadans.

Juláhá, ...	25,607
Kalál, ...	276
Kunjrá, ...	171
Pathán, ...	4,434
Sayyid, ...	1,070
Shaikh, ...	4,175
Unspecified, ...	22,478
Total, .	58,211
Total of Natives of India, . . .	1,237,029
Total of Asiatics, .	1,237,029
Grand Total, . .	1,237,123

Immigration.—The Deputy Commissioner reports that the authority of the old Munda or Uráon chiefs has been almost entirely effaced by that of Hindu farmers, introduced by the superior landlord or by the numerous holders of religious or maintenance grants. In some villages the aborigines have completely lost their proprietary rights, and have been reduced to the position of farm labourers. The grain merchants (*mahájans* or *sáhus*), whose money-lending system is described in the paragraphs on Capital and Interest, are, with hardly an exception, immigrants from Behar, who have settled permanently in Chutiá Nágpur and Palámau. No statistics exist showing the number of immigrants, or the proportion of those who settle permanently in the District, as compared with those who ultimately return to their original homes.

Emigration.—Up to the year 1867 emigration went on from Lohárdagá District to a very considerable extent. The total number of emigrants in the four years from 1864 to 1867 inclusive, was 12,369. Members of every tribe and caste in the District were to be found among the emigrants, but more than half of them belonged to aboriginal races, the Mundas numbering 3986; Uráons, 1058; Bhuiyás, 1546; total, 6590. Of Hindus, the castes most largely represented were the following:—Goálá, 618; Káhár, 133; Tántí, 392; Kurmí, 267; Lohár, 958; Kharwár, 265; Surí or Sunrí, 191; Dom, 475; Dosádh, 142; Ghási, 249. From 1867 to 1872 the official returns show a marked decrease in the number of emi-

grants. Thus in 1868–69, 883 persons emigrated from Lohárdagá; in 1869–70, 877; in 1870–71, 630; and in 1871–72, 542. In 1872–73, the number rose to 1405. The figures for this last year do not include the labourers recruited by 150 garden *sardárs*, to whom certificates were given under Act VII. (B.C.) of 1871. If each *sardár* on an average recruited twenty coolies, 3000 should be added to the foregoing return to obtain the total number of emigrants for that year. All these men went to the tea-districts of Assam and Cachar. No emigration takes place from the Palámau Subdivision, where population is sparse, and immigration from the surrounding Districts is on the increase.

Besides the regular emigration to the tea-districts, there is a considerable efflux of labourers from Lohárdagá to Calcutta and other places, in search of agricultural employment. They leave their villages after the December harvest, and return within about four months to resume their own cultivation. This practice is partly owing to the fact that Chutiá Nágpur Proper is chiefly a rice-growing country, and has hardly any spring crop of pulses. During the slack season, therefore, that intervenes between reaping the winter rice crop and sowing the autumn rice and the highland rice known as *gorá dhán*, the labourers go off to other Districts to find employment.

Aboriginal Tribes: Introductory.—Before entering upon a detailed account of the various aboriginal races of Lohárdagá District, it may not be out of place to explain the system on which those races are classified. All the aboriginal dialects spoken in the Province of Chutiá Nágpur agree in possessing the structure known as "te minational," and are included in the southern division of the Turan family of languages. Certain of these dialects, in particular spoken by the Gonds of Udaipur and Sargújá, the Uráons of Nágpur Proper, and the Paháriás of the Rájmahál Hills striking affinities with the civilised Turanian languages of of India, and are therefore classed with them by Pro Müller as Tamulic. Others, again, such as Santálí, M the language of the Hos or Larka Kols of Singbhúm, ha in common with the Tamulic languages, and are plac Müller in a separate class under the name of Munda. Campbell, in his work on Indian Ethnology, publishe divides the aboriginal races of "the hilly count and southern borders of Bengal, Behar, and B

of the Haidarábád and Madras territories, and from the Eastern Ghâts inland to the civilised portions of the Nágpur territory of the Central Provinces," into two great classes—the Dravidian aborigines, speaking dialects allied to the Dravidian languages of the south, and the Kolarian or northern aborigines, whose dialects are of the type which Max Müller calls Munda. The wider linguistic affinities of these latter dialects, and the origin of the people who use them, were, however, still left in uncertainty. Max Müller, in his letter on the Turanian languages, had spoken of them as unconnected with any other tongues; and Hodgson, in his Essay on the Koch, Bodo, and Dhimál tribes, had considered them Tamulian, and ascribed the divergence of the Kolarian dialects from the Dravidian type to the dispersion of those races in the wild jungles of Central India. Sir George Campbell, while remarking on Hodgson's wish to establish a connection between the inhabitants of the south and the eastern races of Bengal, and his very extended use of the term Tamulian, pointed out certain peculiarities common to the Ho dialect of Singbhúm and the Dravidian languages. Thus, both in the Kolarian and Dravidian tongues there is no regular gender, all inanimate things are neuter, and the terms male and female are prefixed when required. Adjectives are not declined, nor are there degrees of comparison. There are two forms of the plural of the first personal pronoun and of its corresponding possessive pronoun, one of which includes, and the other excludes, the person addressed. The place of relative pronouns is supplied by using participles, and "the man who went" would be expressed in Ho by "the gone man." On the

her hand, the Kolarian tongues seem to be more highly inflected

the Dravidian, and have a regular dual form, which the latter

not. Moreover, the vocabularies of the Kolarian tongues are

omplete, and show fewer traces of borrowing from their neigh-

l but the very simplest words. Thus, in the matter of

while the Gonds do not count beyond ten, the Uráons

, and the Rájmahali Paháriás beyond two in Dravidian

it borrow all the rest from Hindí; the Kols and Santáls

high numbers in their own language.

s point, then, the only attempt to account for the Kol-

was the suggestion of a remote connection between them

avidians, the traces of which are preserved in the struc-

of the dialects. Colonel Dalton, however, in his

thinks that there cannot be a doubt of the

remote north-eastern origin of the Kolárian tribes; and supports his view by citing Hodgson's opinion that an affinity with Munda or Kol could be traced in the pronominalisation of some of the languages of the Kiratis, Hayas, and other broken tribes of Nepál. He also refers to "the Talaings or Mon of Pegu, who speak a language quite distinct from the Indo-Chinese tongues of the adjoining tribes, but which strongly resembles the Munda or Ho language of Chutiá Nágpur and Singbhum. Mr J. R. Logan, quoted by Colonel Phayre in his history of the Burmah race, considers 'the radical identity of the relative pronouns, definitives, and numerals of the Kols with those of the Mon-Anam group as established. Both groups in their glossarial basis are branches of one formation, much more akin to Tibetan Burman than Dravidian.'" Mr Logan has also noticed a linguistic affinity between the Kásiás of Assam and the Kols; and there is a remarkable resemblance between the funeral ceremonies and the sepulchral monuments of the Kásiás and the Hos of Singbhúm. This latter point of resemblance is referred to in the Statistical Account of Singbhúm District (vol. xvii. pp. 54, 55), and is noticed here merely for its bearing on the supposed north-eastern origin of the Kolarian tribes. Colonel Dalton also remarks on the minute correspondence between the national dance of the Hayas, as described by Dr Campbell, and that of the Hos and Santáls, both being circular dances of a most peculiar kind.

HILL TRIBES AND ABORIGINAL PEOPLE.—The following are the aboriginal tribes of Lohárdagá District, with their numbers as ascertained by the Census of 1872:—

(1.) ASUR, 897; iron-smelters, and, to a limited extent, cultivators. For a fuller notice of the Asurs see the Statistical Account of the Tributary Mahals of Chutiá Nágpur (vol. xvii.)

(2.) BHAR, 1046; probably connected with the Rajwárs. They are referred to again in the Account of Mánbhúm District (vol. xvii.)

(3.) BHUIHAR, 940. This tribe is confined to Palámau, and is not found in Chutiá Nágpur Proper. They are said to be good cultivators, which Colonel Dalton understands to mean that they are docile farm labourers and beasts of burden. The tribe is most largely represented in the State of Sargújá, and accordingly a fuller notice of them is reserved for the Account of the Tributary Mahals (vol. xvii.)

(4.) BINJWAR, 2665; are said to be immigrants from the Vindhyá mountains. They speak Hindí only, but in appearance and customs

resemble the aboriginal tribes of the Dakhin; and Colonel Dalton thinks they may possibly be connected with the Bhíls.

(5.) BÍRHOR, 227. This small tribe is noticed at some length in the Account of Hazáribágh (*ante* pp. 63–65). The following remarks, so far as they deal with the customs of the tribe, are condensed from Mr Forbes' Settlement Report on Palámau Subdivision. The Census Report of 1872 returns the total number of Bírhors in the Chutiá Nágpur Division at 393, of whom 132 are in Hazáribágh, 227 in Lohárdagá, and 34 in the Tributary Mahals. Only five were enumerated in Palámau, but owing to their migratory habits this does not necessarily affect the correctness of the experimental Census of 1869, which returned the Bírhors in Palámau at 87. The Bírhors are an aboriginal tribe of the lowest type, and doubtless of Kolarian origin. Their language is composed of a mixture of Mundárí and Santálí words, with some words which Mr Forbes could not identify as belonging to either of those languages. They live only on the tops and high spurs of the hills, cultivating nothing, and feeding on monkeys, birds, and jungle products. They also tame monkeys and teach them to dance; the drum used in Kol festivals is made by Bírhors. In appearance they are small, very black, and sharp featured; and they wear their long matted hair hanging over their faces. When they have exhausted the supply of their favourite jungle roots on any particular range of hills, they send out scouts to explore the country, and select a fresh range where food may be found. On the return of the scouts the whole tribe migrates to its new habitat, keeping to the most remote forest paths, and only crossing the open when it cannot be avoided. The Bírhors do not form compact villages, but live in groups of two or three families, scattered along the range of hills from which they gather their food. Their marriage is of the most primitive form, simulating the chase and forcible abduction of the bride by the bridegroom. As soon as a young couple have agreed to marry, the elders of both families collect all available resources for a feast. Roast-pig, stewed-monkey, herbs cooked in fat, and all sorts of roots, make up the bill of fare, with plenty of rice-beer, or, if that cannot be obtained, the intoxicating liquors made from the plants *khulu* and *khasuná*. When the feast is ready, the members of the two families sit down in a line opposite one another, and the father of the bridegroom addresses the bride's father, to the effect that his son is swift of foot and is calling on his bride. The girl's father

then turns to her, and tells her to run and show her lover how fleet she is. On this, she gets up and runs into the jungle, and after a minute's interval her lover follows to catch his bride. During the chase the assembled company chant a kind of song, in which one side praises the speed of the bridegroom, and the other that of the bride. The song goes on till the shout of the boy, as he succeeds in catching the girl, is heard, when silence follows. The marriage is consummated at once in the jungle, and the girl on returning to the company is dressed by the women in a new *sári* of coarse country cloth, the bridegroom's present. After this, the feast commences, and is kept up sometimes for two or three days.

(6.) Chero, 9756. Out of the total number of Cheros recorded in Lohárdagá District at the time of the Census of 1872, 9736 belonged to the Subdivision of Palámau, and only 20 were residents of Chutiá Nágpur Proper. General tradition ascribes numerous monuments throughout Behar to the Cheros; and they are said to have ruled as a sovereign race over the plateau of Sháhábád, from which they were expelled by the Savars, Siviras, or Suars, a race of whom scarcely the name remains in Behar. Mr Forbes, in his Settlement Report, gives a local tradition recorded by a former *kánúngo*, or land-registrar, of Palámau, to the effect that the Cheros, starting from Morang, took Kumáon, and thence, led by Rájá Phul Chánd, made themselves masters of Bhojpur, where they reigned for seven generations. In A.D. 1611, a large army of Cheros under Rájá Sháhábal Rái marched to Champáran, and laid waste the country up to the foot of the Tarái. Sháhábal Rái was captured by the troops of Jahángír, and died fighting a tiger single-handed before the Emperor at Dehli. In the following year (1612) Bhagwant Rái, son of Sháhábal Rái, took service with a large body of retainers under Mán Sinh, the Ráksel Rájá of Palámau; and in 1613 treacherously murdered Mán Sinh's family, and made himself the first of a long line of Chero Rájás, who ruled in Palámau for nearly two hundred years.

The following paragraphs relating to the Cheros are quoted from Colonel Dalton's *Ethnology of Bengal*. "The distinctive physical traits of the Cheros have been considerably softened by the alliances with pure Hindu families, which their ancient power and large possessions enabled them to secure; but they appear to me still to exhibit an unmistakable Mongolian physiognomy. They vary in colour, but are usually of a light brown. They have, as a rule, high cheekbones, small eyes obliquely set, and eyebrows to correspond,

low broad noses, and large mouths with protuberant lips. It appears from Buchanan that the old Cheros, like the dominant Kolarian family of Chutiá Nágpur, claimed to be Nágbansís, and had the same tradition regarding their origin from the great 'Nág,' or dragon, that has been adopted by the Chutiá Nágpur family. The latter were, it seems, even in Gorakhpur and Behar, allowed to be the heads of the Nágbansí family, and Buchanan considered them to be Cheros; but they are, no doubt, originally of the same race as their Kol subjects, though frequent alliances with Rájput families have obliterated the aboriginal lineaments. The western part of Kosála, that is, Gorakhpur, continued some time under the Cheros, after other portions of that territory had fallen into the hands of the people called Gurkha, who were in their turn expelled by the Thárus, also from the north. In Sháhábád, also, the most numerous of the ancient monuments are ascribed to the Cheros, and it is traditionally asserted that the whole country belonged to them in sovereignty. Buchanan suggests they were princes of the Sunaka family, who flourished in the time of Gautama, about the sixth or seventh century before the Christian era. An inscription at Buddh Gayá mentions one Phudi Chandra, who is traditionally said to have been a Chero. The Cheros were expelled from Sháhábád, some say, by the Savars or Suars, some say by a tribe called Hariha; the date of their expulsion is conjectured to have been between the fifth and sixth centuries of the Christian era. Both Cheros and Savars were considered by the Bráhman of Sháhábád as impure or Mlechchhas, but the Harihas are reputed good Kshatriyas.

"The overthrow of the Cheros in Mithila and Magadha seems to have been complete. Once lords of the Gangetic provinces, they are now found in Sháhábád and other Behar Districts, only holding the meanest offices, or concealing themselves in the woods skirting the hills occupied by their cousins, the Kharwárs; but in Palámau they retained till a recent period the position they had lost elsewhere. A Chero family maintained almost an independent rule in that *parganá*, till the accession of the British Government; they even attempted to hold their castles and strong places against that power, but were speedily subjugated, forced to pay revenue and submit to the laws. They were, however, allowed to retain their estates; and though the rights of the last Rájá of the race were purchased by Government in 1813, in consequence of his falling into arrears, the

collateral branches of the family have extensive estates in Palámau still. According to their own traditions, (they have no trustworthy annals) they have not been many generations in the *pargana*. They invaded that country from Rohtás; and with the aid of Rájput chiefs, the ancestors of the Thákurais of Ranká and Cháinpur, drove out and supplanted a Rájput Rájá of the Ráksel family, who retreated into Sargújá and established himself there. It is said that the Palámau population then consisted of Kharwárs, Gonds, Márs, Korwás, Parheyás, and Kisáns. Of these, the Kharwárs were the people of most consideration; the Cheros conciliated them, and allowed them to remain in peaceful possession of the hill tracts bordering on Sargújá. All the Cheros of note who assisted in the expedition obtained military-service grants of land, which they still retain. It is popularly asserted that at the commencement of the Chero rule in Palámau, they numbered twelve thousand families, and the Kharwárs eighteen thousand; and if an individual of one or the other is asked to what tribe he belongs, he will say, not that he is a Chero or a Kharwár, but that he belongs to the twelve thousand or to the eighteen thousand, as the case may be. The Palámau Cheros now live strictly as Rájputs, and wear the *paitá*, or caste thread. They do not, however, intermarry with really good Rájput families. I do not think they cling to this method of elevating themselves in the social scale so tenaciously as do the Kharwárs. But intermarriages between Chero and Kharwár families have taken place. A relative of the Palámau Rájá married a sister of Maninath Sinh, Rájá of Rámgarh, and this is amongst themselves an admission of identity of origin. As both claimed to be Rájputs, they could not intermarry till it was proved to the satisfaction of the family priests that the parties belonged to the same class. But the Palámau Cheros, and I suppose all Cheros, claim to be descendants of Chain Muni, one of the Rishís, a monk of Kumáon. Some say the Rishí took to wife the daughter of a Rájá, and that the Cheros are the offspring of their union; others, that the Cheros are sprung in a mysterious manner from the *áshan*, or seat, of Cháin Muni. They have also a tradition that they came from the Morang.

"The Cheros observe, like the Kols, triennial sacrifices. Every three years a buffalo and other animals are offered in the sacred grove of *sarna*, or on a rock near the village. They also have, like some of the Kols, a priest for each village called *páhn*. He is always one of the impure tribes, a Bhuiyá, or Kharwár, or a Parheyá, and

is also called *baigá*. He alone can offer this great sacrifice. No Bráhmanical priests are allowed on these occasions to interfere. The deity honoured is the tutelary god of the village, sometimes called Duár Pahár, sometimes Dharti, sometimes Purgahaili, or Daknai, a female, or Dura, a sylvan god, the same perhaps as the Darhá of the Kols. I found that the above were all worshipped in the village of Munka in Palámau, which belongs to a typical Chero, Kunwar Bhikári Sinh."

Mr Forbes describes as follows the present position of the Cheros in Palámau:—"In Palámau the Cheros are divided into three great divisions—the Bábuán, the Bárahazár, and the Birbandhás. The first class speaks for itself; they are the descendants of the ruling family, and call themselves Chohán, or Chámanbansí, sometimes Chandrabansí Rájputs, and indignantly deny being Cheros. The other two appellations are, I suspect, mere local terms, and have reference probably to their several social positions in the *parganá*. The Bárahazár were probably the Chero army which joined Bhagwant; the Birbandhás are the illegitimate offspring of the former. Both these divisions, though admitting themselves to be Cheros, still, like the Bábuán, claim to be Chohánbansís. The Bábuán freely intermarry with Rájputs, but the other two divisions pretend to intermarry only amongst themselves. This, however, is a mere pretence, for there is not a single family that has not at one time or other intermarried with a Rájput or some other caste. The family appellations of the Cheros are Mauár, Kanwár, Rautiá, Sánwát, and Mánjhi. The Cheros of Palámau now affect the purity of Hindus. The Sakaldwípís and Kanaujiás are their *purohits* or priests; and their *gurus* or spiritual guides are either these Bráhmans or the Gharbási Gosáins. The Cheros all wear the cord, and are looked upon as a division of Kshatriya Rájputs. Bráhmans will drink water from their hands, and eat anything but rice that has been cooked by them. They are much respected, and regarded with deference, as being the descendants of the reigning family, and when spoken to are generally addressed as Mahárájá or Bábu. Their characters differ according to the amount of admixture with Rájput blood. The Bábuán, except in the one instance of the Bisrámpur family, differs in no way from the ordinary Rájput of Behar; but by far the greater portion of them have all the simplicity and truthfulness of the aboriginal tribes, to whom they bear a much closer resemblance than to any of the Aryan castes. But with all this

simplicity of character, the Cheros are a proud race, and exceedingly jealous of their national honour. They have never forgotten that they were once a great people, and that their descent was an honourable one. Only the poorest among them will hold the plough, and none of them will carry earth upon their heads. They are excessively extravagant and fond of show, and will run irrecoverably into debt, so long as they have the smallest fraction of an estate left to give as security. These habits have been pandered to by the craftier Aryan castes, and one by one the Cheros have almost all allowed their estates to slip from them. Many of them thus driven have sold their estates, but the greater number have mortgaged them, and still get a small rent."

(7.) JHORÁ GOND, 1338; are only found in Chutiá Nágpur Proper. A notice of them is given in the Statistical Account of the Tributary Mahals (vol. xvii.)

(8.) KHARRIÁ, 21,019. The following paragraphs relating to the Kharriás of Chutiá Nágpur Proper are quoted from Colonel Dalton's *Ethnology of Bengal*. The wilder tribes of hill-Kharriás are noticed in the Statistical Account of Mánbhúm District (vol. xvii.):—"The tribes that are linguistically most closely allied to the Juángs of Cattack are the Kharriás. They are found in Singbhúm in a very wild state, living much in backwoods and on the tops of hills apart from the Hos and Bhúmij, who are somewhat in dread of them, as these isolated Kharriás have the reputation of being great wizards. They are found in the Mánbhúm hills bearing the same name, and I apprehend that the people called Bírhor in Hazáribágh District are of the same tribe. The Kharriás are also seen in villages with other tribes as farm labourers; but on the Chutiá Nágpur estate they are found in large communities, and the Kharriás belonging to these communities are far more civilised than those who live apart. The best settlements lie near the southern Koel river, one of the streams that rise on the Chutiá Nágpur plateau, the principal source of the Bráhmaní. This river the Kharriás venerate as the Santáls do the Dámodar, and into it they throw the ashes of their dead. At the village of Aghurma, not far from it, I collected about me a number of the tribe, and they gave the following account of themselves. Their ancestors were formerly settled between Rohtás and Patná. They quarrelled with their relations and fled into the jungles, and wandered till they came to the Koel river, where finding unoccupied lands to suit them, they settled first at a place they called Pora

on that river, from whence they spread in different directions. Their settlements have much diminished in consequence of the interference of the interlopers who obtained from the Rájá the farms of their villages, and many have gone to settle in the estate called Bírú Kasalpur, in the south-west corner of Lohárdagá District, the landlord of which gives them lands to clear on very fair terms. But there was also a tradition that they had come from the south, and that, driven from the country they had originally occupied, they had ascended the valley of the Koel till they found themselves in their present location. Their veneration for the Koel, and the fact that in some customs where they differ from the Kols they approach the practices of Dravidian tribes, supports this account; but both may be true. They may have fallen back south from the Gangetic provinces, passed through the Vindhyan range, and come gradually round to the south-eastern watersh[illegible] Chutiá Nágpur. They worship the sun under the name of Bero. Every head of a family should, during his lifetime, make not less than five sacrifices to this divinity—the first of fowls, the second of a pig, the third of a white goat, the fourth of a ram, and the fifth of a buffalo. Bero is then considered sufficiently propitiated for that generation, and regarded as an ungrateful god if he does not behave handsomely to his votary. In praying to Bero, they address him as Parameswar, the Hindu word for God. The Ho term Sing Bonga, they do not know. Their sacrifices are always made in front of an anthill, which is used as an altar. This peculiar mode of sacrificing has fallen into desuetude among the Hos and Mundas, but on my making some inquiries on the subject from old men of those tribes, I was informed that it was orthodox, though not now generally practised. Their religious festivals are almost identical with those of the Mundas, described in the account of that tribe (quoted in the Account of Singbhúm, vol. xvii. pp. 48–51). In worshipping Bero, the head of the family acts as priest; but at the *Sarhúl* and other *pujás* or sacrifices offered in behalf of the community, a person is employed as village priest, whose office and name—*páhn*—appear to me to have been introduced into Chutiá Nágpur by the Uráons. From the Hindus they have adopted the custom of solemnising the boring of the ears of the children, and the occasion when the hair is for the first time tied up. They have other ceremonial observances similarly derived; but these, probably, will only be found among the Kharriás on the Koel, who are much mixed up

with Hindus and are under Hindu headmen. I have no doubt their village communities were at one period organised like those of the Mundas, and that they had headmen and village officers of their own tribe, but every trace of this is swept away; and it is strange that whilst the Mundas and Hos struggled for, and maintained, their old institutions, the Kharriás should have submitted to so degrading a change.

"Dancing is an amusement to which the Kharriás, like all Kolarians, are passionately devoted. The only noticeable difference in their style is, that in the energy, vivacity, and warmth of their movements they excel all their brethren. I have already noticed that the Kharriás I am describing burn their dead, and putting the ashes in an earthen vessel, throw them into the river. They afterwards set up in the immediate vicinity of their houses tall rough slabs of stone, and to these, as representing the departed, they make daily oblations. On the whole, their customs sufficiently conform to those of the Mundas to confirm the relationship suggested by the affinity of the tongues; but at the same time there is dissimilarity enough to indicate that, though they were originally one people, it must have been after a very long separation that they again met on the banks of the Koel. These Kharriás are respectably dressed and comfortably housed; and as they are fair cultivators, they are well supplied with wholesome food. They therefore have very little resemblance to the Kharriás of the backwoods, who live as precariously as beasts of prey, and it is difficult to imagine their being of the same race.

"It is a singular circumstance that some tribes of Kharriás profess to be intensely exclusive in regard to cooking and eating. This characteristic I found most developed in villages of Chutiá Nágpur, where Kharriás were associated with Uráons under Bráhman proprietors; and it is a common saying in that part of the country that every Kharriá must have his own *hariá*—cooking-pot. He may not allow even his wife to cook for him; and if a stranger enters a house in which he keeps his earthen drinking and cooking vessels and water-pots, every vessel is polluted, and the whole are destroyed or thrown away. This class of Kharriás are especially filthy in their habits; and it is not improbable that Hindus may have been more than ordinarily harsh in excluding them from their kitchens and inner apartments, and that the Kharriás retaliate by outcasting everybody. There is a tradition that the Kharriás, with another tribe

called Puráns, were the aborigines of Morbhanj, one of the Cattack Tributary Mahals. They aver that they and the family of the chief (Bhanj) were all produced from a pea-fowl's egg—the Bhanj from the yolk, the Puráns from the white, the Kharriás from the shell.

"The Koel Kharriás are, in point of physique, much on a par with the Mundas, rather coarser perhaps in feature and figure, but, where they differ, approximating more to the appearance of a north-eastern tribe. The women are all tattooed with the marks on the forehead and temples common to so many of these tribes—three parallel lines on the forehead, the outer lines terminating at the upper end in a crook, and two on each temple. The Juáng marks of this nature take up a larger space on the forehead and temples than those of the Mundas, the lines being longer and further apart. The Kharriás, in regard to the space over which the marks extend, occupy a middle place between the Juángs and Mundas."

(9.) KÓL, 132,104. The word *Kol* is really a generic term, including the two tribes of Munda Kol, and Larka (*Laraka*) or fighting Kol, which latter is more commonly known as Ho. In consequence of this vague use of the word, the total number of Kols returned in the Census of 1872 is made up partly of Mundas and partly of Hos; some Uráons also, may be included. As, however, the Mundas are separately enumerated, and the Hos are almost entirely confined to Singbhúm, a detailed notice of the latter is reserved for the Account of that District (vol. xvii. pp. 39–59), and the Mundas are dealt with below under No. 11.

(10.) KORWA, 5214. See the Statistical Account of the Tributary Mahals of Chutiá Nágpur (vol. xvii.)

(11.) MUNDA, 163,051. Mention has been made above of the vague popular use of the word *Kol* to include not only the Mundas and Larkas, but all Kolarian aborigines wherever located. In the *Ethnology of Bengal*, Colonel Dalton appears to employ the word in a narrower sense, as a generic term embracing the three principal Kolarian tribes of the Province of Chutiá Nágpur—the Munda Kols of Chutiá Nágpur Proper, the Larka Kols or Hos of Singbhúm District, and the Bhúmij Kols of the District of Mánbhúm. Of this latter tribe, those who live on the borders of Chutiá Nágpur Proper recognise no distinction between themselves and the Mundas. They intermarry, and associate, and coalesce in all matters indicating identity of race. The Bhúmij farther east have become too Hinduised to acknowledge the relationship; and the

Bhúmij of Dhalbhúm, on the borders of Midnapur District, consider themselves autochthones, and will not admit that they are in any way connected with the Mundas, Hos, or Santáls. In selecting the following quotations relating to the Mundas from Colonel Dalton's section on the "Mundas, Hos, Bhúmij," it has been found impossible to draw a rigid line of distinction between Munda and Ho customs. In his account of the Kol or Munda race, Colonel Dalton selected "the Hos as the branch of the people who, from their jealous isolation for so many years, their independence, their long occupation of one territory, and their contempt for all other classes that came in contact with them, especially the Hindus, probably furnish the best illustration, not of the Mundáris in their wildest state, but of what, if left to themselves and permanently located, they were likely to become." Consequently Munda usages are not treated separately, but are indicated in each particular case as differing from those of the Hos. Thus, in the matter of festivals, it is impossible to discover with certainty what are the special Munda festivals as distinguished from those of the Hos; and therefore, all mention of the subject is omitted here, and Colonel Dalton's general description of both Ho and Mundárí festivals is quoted in the Account of Singbhúm (vol. xvii. pp. 48–51).

Origin.—It has already, in the account of the Cheros and Kharwárs (see *ante* pp. 259, 260, and *post* p. 311), been noticed that Behar, the ancient Magadha, has numerous antiquities attributed to the Cheros and Kols; and from the traditions handed down it appears that the sovereigns of the country were at one time Cheros, the people being for the most part Kols. Dr Buchanan Hamilton points to Kábar, the most important of the ruins in Behar attributed to the Cheros or Kols, as evidently the work of a powerful ruler and probably the stronghold of the princes of the race. These legends of the Cheros and Kols are still preserved in Behar. The antiquities, forts, and ruins in all parts of the Province are by the present inhabitants universally ascribed to that ancient dynasty and primitive race. In his account of Sháhábád the same author states that "by far the most numerous monuments of antiquity in this District are attributed to the Cheros, to whom it is universally admitted the whole country belonged in sovereignty. The ancient name of the country was Kekata (Kíkata); and all the tract west of the Són retained that name, whilst the name of the country to the east, formerly a part of Kekata, was changed to Magadha."

"The following passage from the Rigveda, quoted in Dr Muir's *Sanskrit Texts* (vol. ii. p. 362), shows that the Aryans had at a very early period come in contact with the people of Kíkata. 'What are thy cows doing among the Kíkatas? They yield no milk for oblations and they heat no fire.' In the commentary it is explained that Kíkata was a country inhabited by a people who were not Aryans, and the following lines are quoted from the Bhágavata Purána (1, 2, 24)—'Then when the Kálí age has begun, a person named Buddha, son of Anjana, will be born among the Kíkatas, in order to delude the Asuras.' The commentator explains 'that is, in the District of Gayá.' The Kíkatas, therefore, were people who lived in Magadha or Behar. They, or at any rate the dominant race among them, the Cheros, were expelled by the Savars in about 421 of the Sáliváhana era, or 500 A.D. The Dravidian people, who are said to have expelled them from a portion of the country, are always called Siviras in the Puránas; and it is probable that the snake race, Cheros and Kols, to whom the antiquities are ascribed, were Kíkatas. The Kíkatas, according to the commentator Sáyana, being destitute of faith say, 'What fruit will result from sacrifices, claims, or oblations? rather eat and drink, for there is no other world but this'—a doctrine modern Kols decidedly subscribe to. In his account of Gorakhpur, Dr Buchanan Hamilton says that there are many Nágbansís in that District now considered Rájputs, who acknowledge the Rájá of Chutiá Nágpur as the head of the family. If this be so, these Nágbansís are most probably, like the Rájá, of Kol extraction, *i.e.*, they are Mundárí. It appears, therefore, that the Mundas were once located in Magadha, and were still there when Gautama was born; and it has been noticed that the Buddh Gayá sculptures pourtray not Aryan but Turanian or Kol features. Dr Buchanan Hamilton says that the chief people, the Cheros, probably accepted his doctrine, and the lower orders, the Kols, rejected them; and whilst the Cheros became Aryanised, the Kols adhered to the life of freedom and impurity in which they are still found. The Kols are, according to these legends, the earliest settlers in the Gangetic valley that we hear of; and they had been long established there, and had attained some advance in civilisation, when they were dislodged by the Savars.

"Of the great Kol empire we have now no remnants in the Behar Division. The Chero chiefs, on being expelled from it, fell back into Palámau; whilst the chief seat of the Munda race is now the plateau

of Chutiá Nágpur. The central tableland, on which the tribes rallied, is admirably adapted for defence. The approaches to it from the north, north-west, east, and south, are exceedingly precipitous, the paths winding up defiles which a handful of resolute men could hold against hosts of invaders. The highlands in the western and south-western direction stretch into Sargújá and Jashpur, uniting with the Vindhyan mountains in a western direction and the Sátpura range to the south-west. They divide the waters of the Narbadá and Mahánadí, forming a covered way by which fresh accessions of cognates strengthened the growing colonies of Kols on the Jhárkhand or forest tract; and thus were founded the 'strongholds of the ten chiefs,' referred to in the Puránas, and in Colonel Wilford's essays, as the Dasarana, or ten forest forts east of the Són. These Jhárkhand or Chutiá Nágpur chiefs appear to have maintained their isolated and elevated defensive positions throughout the long series of Hindu dynasties, and to have come with an indifferent reputation under the Muhammadan Government. In the 'Report of the Select Committee' it is stated that Bírbhúm District was conferred by 'Jafar Khán on Asad-ulla-Pathán, to guard against the incursions of the barbarous Hindus of Jhárkhand.' It is curious that they should be called Hindus, but the Muhammadans probably regarded as such all who were not of their own faith. From this it would certainly appear that Jhárkhand has, to a comparatively recent period, been regarded by Hindus as out of the pale of Hindustán, occupied by people who differed from them in religion, in customs, appearance, and language.

"I have never found much in Munda or Bhúmij folk-lore that threw light on the early history of the race. The families that rank highest among them have lost such traditions in the hazy fables which Hindus have invented for them. The lower classes, as a rule, declare themselves to be autochthones; and even the chiefs found their claims to be of noble birth on miracles that took place in the country which they call their fatherland. But in a manuscript account of the family of the Rájás of Chutiá Nágpur I possess, it is stated that the Mundáris came to Jhárkhand, afterwards called Chutiá Nágpur, from Pipra and Pálígarh, names that occur in the Santál traditions. It is also stated that the Mundas as well as the Uráons fought with the Lowrik Sumwará, no doubt the Lowrik Sowrik of the Uráons, whom I suppose to have been Saráwaks or Jains, and were worsted; having to fly from their own country,

they successively occupied Jaipur, Chitor, Simaliya, Ruhidás, and at last found themselves in Jhárkhand. It is noticeable that the Ruhidás hills are said to have afforded a refuge, or temporary resting-place to the Kharwárs, the Kharriás, the Mundárís, and the Uráons; but whilst the Mundárís seldom speak of Ruhidás as a place they are interested in, I have often heard them speak of it as the place that the Uráons came from. It is not, however, improbable that several tribes of aborigines may have made a stand in the Ruhidás and Kaimur hills at different times, before they were finally forced back into Palámau, Jhárkhand, and the Vindhyan hills.

VILLAGE ORGANISATION.—"The Mundárís say they had no Rájá when they first occupied Chutiá Nágpur. They formed a *congeries* of small confederate states. Each village had its chief, also called a *múnda*, literally 'a head' in Sanskrit; and as a village often consisted of one family, the inhabitants were all of Munda dignity, and hence it became a name for the whole tribe. What the original name for the tribe in their own language may have been, I do not know; but as the Mundárís on the plateau call themselves Konk Pát Munda, Konk or Konkpát may have been a national denomination. They appear to have only one word for ruler, the term *gúmki*, and they apply it to every one in authority. In Mánbhúm District, the word *múnda* becomes *mura*, which is also Sanskrit, and has the same meaning. As these Kols have taken up the word *múnda*, the Santáls have appropriated the term *mánjhi*, and the Bhúmij *sirdar*. The Mundárí villages had each its own staff of officers, and from the customs that still prevail in most old villages, the organisation that has descended from primitive times appears to have been very complete. The system of government that obtained among the Mundas and Uráons of Chutiá Nágpur, before their polity was disturbed by the conversion of their chief, may still be discerned in the existing organisation. The country was divided into groups of twelve or more villages, called *parhás*, each under a headman, who was generally called the *múnda*. Although not recognised by the authorities in the administrative divisions of the present time, the people still acknowledge the *parhá* jurisdiction; and questions affecting their social relations are still adjusted in *parhá* conclave. Each village had, besides, its establishment of hereditary public servants, who still exist. The principal of these are the representatives of the most influential of the patriarchs. They originally formed the colony, and each is literally a pillar of the little state called

khūnt. The head of one of these *khūnts* or families is the chief or *múnda*, of another the *páhn*, or priest, and there is sometimes a third called *máhato*, the *múnda's* deputy. The headmen had no superior rights in the lands cultivated by other villagers. They were not landlords but chiefs, and they and the people acknowledging them held the soil they cultivated in virtue of their being the heirs of those who first utilised it; and when it became necessary to distinguish such men from cultivators of inferior title, the former were called *bhuinhárs*, breakers of the soil. When the Mundárís and Uráons submitted to a Rájá, and all were required to contribute to his maintenance, the people in each village were divided into two classes. The more privileged, who retained the designation of *bhuinhár*, had to give honorary attendance and constituted the militia of the state. The remainder supplied food and raiment; but these obligations were eventually commuted for money payment or rent, and the lands cultivated by this class were called *rájhas*, or rent-paying, in contradistinction to the *bhuinhári*, which were, no doubt, originally rent-free. At a late period, the Rájá was allowed to hold in each village a proportion of land called *mánjihas*, which was cultivated for his sole benefit; and the persons who cultivated this land for him or his assigns had lands allotted to them, subject to no other service and no rent, called *beth khetá*. Besides the above, there were lands set apart for the expenses periodically incurred in the propitiation of the national and local deities, by which means the Kols provided against the dangers that threatened their gods from impending changes of belief. The produce of the lands has never, that I am aware of, been appropriated to the service of the Hindu divinities, though the people contribute something yearly towards the public worship of Kálí, inaugurated by the *zamíndárs;* if, however, the villages were all to adopt a new religion, they would doubtless assert their right to devote the assets of what may be called their church lands to the service of the newly-adopted faith.

"The Religion of the Mundárí possesses a Shamanistic rather than a Fetish character. They make no images of their gods, nor do they worship symbols; but they believe that, though invisible to mortal eyes, the gods may, when propitiated by sacrifice, take up for a time their abode in places especially dedicated to them. Thus, they have their 'high places' and their 'groves'—the former, some mighty mass of rock to which man has added nothing, and from which he takes nothing; the latter, a fragment of the original forest.

the trees in which have been for ages carefully protected, left when the clearance was first made, lest the sylvan gods of places, disquieted at the wholesale felling of the trees that sheltered them, should abandon the locality. Even now, if a tree is destroyed in the sacred grove (the *jáhirá* or *sarna*), the gods evince their displeasure by withholding seasonable rain. Sing Bonga, the creator and preserver, is adored as the sun. Prayer and sacrifice are made to him as to a beneficent deity, who has no pleasure in the destruction of any of his creatures, though, as a father, he chastises his erring children; and to him our gratitude is due for all the benefits we enjoy. He is said to have married Chandra Omol, or the moon, but she deceived him on one occasion and he cut her into two; but repenting of his anger, he allows her at times to shine forth in full beauty. The stars are her daughters. The worship of the sun as the supreme deity is the foundation of the religion of the Kols in Chutiá Nágpur, and also of the Uráons, who address him as Dharmí, the Holy One. He is not regarded as the author of sickness or calamity, but he may be invoked to avert it; and this appeal is often made, when the sacrifices to the minor deities have been unproductive. The other deities are all considered subordinate to Sing Bonga, and though they possess supernatural powers, there are cases beyond their authority; but when they are invoked in such cases, it is their duty to intercede with Sing Bonga, and so obtain for their votaries the solicited relief. This notion of the intercessional power of the minor spirits is remarkable. Chanala Desum Bonga and his wife Pángora have been included among the minor deities of the Hos, but these are the styles under which Sing Bonga and his wife Chandra Omol desire to be worshipped by female votaries. Chanala is to women what Sing Bonga is to men.

"The following singular story has recently been recounted to me by a Mundárí *páhn*, or priest, of a village in the southern quarter of Chutiá Nágpur Proper. There were formerly people in heaven who served Sing Bonga. They absented themselves from work because, seeing their faces in a mirror, they found they were in God's image, and therefore his equals. Thereupon God expelled them from heaven, and they fell in a place that goes by the name of Terasi Pirhi Ekasibasi. They found there quantities of iron ore, and immediately made seven furnaces and commenced smelting it; the fire burnt the trees and the grass, and the smoke and the sparks ascended to heaven. This went on night and day.

It disturbed Sing Bonga, and he gave orders that if they worked all day, they must stop all night; or if they worked all night, they must stop all day; but they would not obey. Sing Bonga then sent two king crows and an owl to warn them, but they did not attend; and they tried to catch the birds with their furnace tongs, and spoil their long tails. Then he sent a crow and a *lipi* (lark). The crows were formerly white, but the Vulcans caught the crow sent by Sing Bonga and smoked it black, and they made the *lipi* red and flattened its head; but the orders of Sing Bonga were not carried out. Other messengers were sent, with no better success. Then Sing Bonga resolved to go himself, and he stopped at the house of Lútkum Háram and Lútkum Búri, an old couple who made charcoal, and he served them *incognito* for some time, and amused himself by playing with the smelters' children. They played with balls of iron, he with eggs, but the eggs smashed the iron balls. When the old man and his wife went to the woods to make charcoal, they left Sing Bonga in charge of the hut, and told him to watch the *dhán* (rice) laid out to dry; but he played all the time, and the fowls ate up the *dhán* except a few grains, and when the old couple returned, they mourned for the loss of the dinner. But Sing Bonga consoled them, and taking the few grains that were left, he filled all the pots with them; and when the old people accused him of having stolen rice to make good what was lost by his carelessness, he answered mildly, 'No, God gives it.' The furnaces of the smelters were now continually falling in, and the smelters sought an *ojhá*, or diviner, to ascertain the cause; but as they could not find one, they placed rice on a winnowing-fan, and it led them to Sing Bonga, and they asked him what they should do. He replied, 'You must offer a human sacrifice.' But they could not find a man, and returned to Sing Bonga, who said that he himself would be the sacrifice. Then, under his direction, they made a new furnace, and instead of iron ore, they put Sing Bonga into it, and blew the bellows; and when there was sufficient heat, as they had been instructed, they sprinkled water on the fire, and Sing Bonga appeared uninjured, but from the furnace flowed streams of gold and silver, and precious stones shining like the sun. Then Sing Bonga said, 'See what one person has done; if you all pass through the furnace, what a heap of wealth you will have!' They agreed to be smelted, and they entered the furnace and were shut up, and Sing Bonga made their wives blow the bellows. When the people inside began to howl,

the women were alarmed, and would have stopped, but Sing Bonga said, 'Blow away! they are only quarrelling over the division of the spoil.' Thus they were all destroyed, because they had not obeyed the word of Sing Bonga. Then the women said, 'You have killed our husbands, what are we to do?' Sing Bonga then assigned to each of these women a locality, and they became the minor deities or *bhúts*, male and female. Some had rocks, some groves, some pools, some rivers, as their abodes; and thus originated the Naiads and Dryads, the Marang-Búrú or Búrá Bonga of the hills, the Desaulis of the groves, and the Naga Eras of the streams.

"The next in order among the gods after Sing Bonga is Marang-Búrú or Búrá Bonga, the mountain god. The highest or most remarkable hill or rock in the neighbourhood is the shrine of this deity or spirit. The Kols evidently recognise the importance of wooded hills in securing the needful supply of rain; and trusting entirely to rain for irrigation, and regarding Búrú Bonga as the head of the heavenly water department, they naturally pay him special attention. Every third year, in most places, buffaloes are sacrificed in his honour, and fowls and goats every year. He is also invoked in sickness. In Chutiá Nágpur a remarkable bluff, near the village of Lodhma, is the Marang-Búrú or Mahá-Búrú for a wide expanse of country. Here people of all castes assemble and sacrifice—Hindus and even Muhammadans, as well as Kols. There is no visible object of worship; the sacrifices are offered on the top of the hill, a bare semi-globular mass of rock. If animals are killed, the heads are left there, and afterwards appropriated by the *páhn*, or village priest. Hindus say that the Marang-Búrú, as a deity, is the same as Mahádeo; but under what name the Muhammadans pay devotions to him I know not. They aver, however, that they cannot exist in Chutiá Nágpur without propitiating the local deities. Every village has in its vicinity a grove reputed to be a remnant of the primeval forest, left intact for the local gods when the clearing was originally made. Here Desauli, the tutelary deity of the village, and his wife, Jhár-Era or Mabúrú, are supposed to sojourn when attending to the wants of their votaries. There is a Desauli for every village, whose authority does not extend beyond the boundary of the village to which his grove belongs; if a man cultivates land in another village than the one in which his home is, he must pay his devotions to the Desauli of both. The grove deities are held responsible for the crops, and are especially honoured at all the great agricultural

festivals. They are also appealed to in sickness. The next in order are Nága-Era or Naiads, who preside over tanks, wells, and any bodies of stagnant water (called Ekhir-Bonga by the Mundáris); and Garhá-Era, the river goddess. They, too, are frequently, and no doubt very truly, denounced as the cause of sickness, and propitiated by sacrifices to spare the sufferers. The remaining spirits are the ancestral shades, who are supposed to hover about, doing good or evil to their descendants. They are often denounced as the cause of calamitous visitations, and propitiatory offerings are made to them; but besides, a small portion of the food prepared in every house is daily set apart for them. The ancestors are the Penates, and are called Ham-ho. The ancestors of the wife have also to be considered; they are called Horatan-ho, because sacrifices to them are always offered on the path *hora*, by which the old woman came as a bride to the house.

"THE MUNDÁRI MARRIAGES, as solemnised in most parts of Chutiá Nágpur, have many ceremonies, some of which appear to have been taken from the Hindus; at all events the ceremonies I allude to are common to Hindus and aborigines, but it is not always easy to decide by whom they were originated. We may, however, safely assert that practices common to both, which are not in accordance with the ritual prescribed in the Vedas, are derived from the aborigines. Among Mundas having any pretensions to respectability, the young people are not allowed to arrange these affairs for themselves. Their parents settle it all for them, French fashion; and after the liberty they have enjoyed, and the *liaisons* they are sure to have made, this interference on the part of the old folk must be very aggravating to the young ones. The *pan*, or purchase money paid for the bride, varies from Rs. 4 to Rs. 20 (8s. to £2); but the marriage feast is very liberally provided, and as it takes place at the bride's house, the expense chiefly falls on her father. When the day for the wedding is fixed, the bridegroom goes in some state to the bride's house, the young men who accompany him being armed and fantastically dressed. As they approach the village of the bride, her friends come out to meet them in similar guise, and a mimic fight takes place which ends in the simultaneous rush of the whole party into the village, making a terrible row. The bride and bridegroom are now well anointed with turmeric, and then taken and wedded not to each other but to two trees, the bride to a *mahuá*, the groom to a mango, or both to mangoes. They are made to touch the tree

with red lead (*sindúr*), and then to clasp it, and they are tied to it. On returning they are placed standing face to face, the girl on a curry-stone over a ploughshare, supported on sheaves of grass or corn. The bridegroom stands ungallantly treading on his wife's toes; in this position he touches her forehead with the red lead, and she touches his forehead in a similar manner. The bridesmaids, after some preliminary splashing and sprinkling, pour a jar of water over the head of each. This necessitates a change of raiment, and apparently concludes the ceremony, as the young people now go inside to change, and do not appear again till the cock crowing announces the approach of dawn. At the first crow the bridesmaids, who with the young men have been merrily keeping it up all night with song and dance, burst into the nuptial chamber and bring forth the blushing bride and her bashful lord and their clothes. They all go to the river or to a tank to wash the clothes and bathe; and parties of boys and girls form sides under the leadership of the bride and bridegroom, and pelt each other with clods of earth. The bridegroom next takes a water vessel, and conceals it in the stream or water for the bride to find. She then conceals it from him, and when he has found it, she takes it up, filled with water, and places it on her head. She lifts her arm to support the pitcher, and the bridegroom standing behind her with his bow strung, and the hand that holds it lightly resting on her shoulder, discharges an arrow through the pretty loophole thus formed, into the path before her. The girl walks on to where the arrow falls, and with head erect, still bearing the pitcher of water, picks it up with her foot, takes it into her hand, and restores it to her husband with a graceful obeisance. She thus shows she can adroitly perform her domestic duties, and knows her duty to her lord and master; whilst he, on his part, in discharging an arrow to clear her path of an imaginary foe, indicates that he is prepared to do his duty as her guide and protector for life.

IRON-SMELTING.—"The Kols, generally, understand the smelting of iron. Their country is rich in that mineral; but it is the wilder clans, the mountain Kharriás, the Bírhors, and in Lohárdagá, the Asúrs and Agariás, that chiefly utilise it. Those who devote themselves to it regularly, pay no attention to the cultivation of the soil. The Mundas have also acquired the art of washing for gold in the streams and rivers that drain the plateau of Chutiá Nágpur, or rise in the bordering hills which are all auriferous; but the

average quantity obtained is not more than suffices to give a bare subsistence to the persons employed, including men, women, and children. The richest field, Sonápet, is the valley of the Sonai river below the plateau opening on Kharsáwán. The population are all Mundáris, enjoying a rich soil, a most romantic and ...ered situation, and low fixed rents. This last advantage was ... them after the insurrection of 1831, in which they heartily

...OD.—"The Hinduised Munda abstains from most meats which ...ndus consider impure, but it is not safe to place a fat capon in his way. Other Mundas, and all the Hos, eat beef, mutton, goats' flesh, fowls, fish, hares, and deer. Pigs are not much relished except by the poorer classes; and the flesh of bears, monkeys, snakes, field mice, and other small game that the Uráons and Santáls affect, the Mundas and Hos do not approve of. They will take from our hands cakes, bread and the like, but not cooked rice. In regard to cooked rice these tribes are exceedingly particular. They will leave off eating if a man's shadow passes across their food.

"Very few of this people have been known to take to trade as a pursuit, but the Kols of one small section of Chutiá Nágpur, Tamárh, known as Tamáriás, form an exception. They are employed chiefly as brokers for the purchase of the produce of the wilder parts of the Kolhán; but owing to extension of the market system, and a growing predilection on the part of the Kols for more direct dealings with the traders, the Tamáriás' occupation as brokers is on the wane.

PROPERTY.—"An equal division of property amongst the sons is the prevailing custom of inheritance; but they live together as an undivided family until the youngest boy attains his majority, when the division is made. The sisters are regarded as live-stock, and allotted to the brothers just as are the cattle. Thus, if a man dies, leaving three sons and three daughters and thirty head of cattle, on a division each son would get ten head of cattle and one sister; but should there be only one sister, they wait till she marries, and divide the *pan*." The *pan* is the price of a wife, paid by her husband to her father's family, and usually consists of about six head of cattle. In Singbhúm the *pan* is higher than in Chutiá Nágpur, and the question of its amount is there found to affect seriously the number of marriages.

The funeral ceremonies of the Hos or Larka Kols, as described at

length by Colonel Dalton, have been given in the Statistical Account of Singbhúm District (vol. xvii. pp. 53–57).

CHARACTER, &c.—"The Mundáris are not so truthful and open as the Hos of Singbhúm, nor do I consider them so manly and honest; but the Mundas have lived for ages under conditions ill-calculated to develop the good qualities for which I have the Hos credit. There has been a continual struggle to what they consider their rights in the land, against the interest of the landlord or his assigns. The very conditions which most of them hold their lands place them in a position dependence and inferiority, as they have to labour for their landlord as well as pay rent to him. Moreover, they live among a people who look down on them as a degraded race, and one of whose favourite theories is, that the Kols were created to serve them. This, no doubt, must be as demoralising as it is aggravating; and in many places the Mundáris and Uráons have listened to it so long that they begin to accept the doctrine, and calmly subside into the position of serfdom allotted to them. The licentiousness indulged in by Mundáris and Hos at their great festival is, of course, incompatible with purity and chastity, and there is no doubt that the majority of the elders are terrible sots; but in Singbhúm the rising generation show a disposition to abandon sottish and licentious habits, and it is satisfactory to know that they can be entirely weaned from them. About seven thousand Mundas have now embraced Christianity, and recently the movement has extended to the Hos of Singbhúm. One of the *mánkis*, with all his family and a considerable number of his villagers, has been baptized; and, generally speaking, all those who have embraced our religion have entirely withdrawn from participation in the wild revelry of their pagan brethren. Their pastors have made this a test of their sincerity, and it is no doubt a very severe one. The women must lay aside all their trinkets, and should not be seen, even as spectators, at dances. The last condition is too hard, and is, I know, frequently evaded; but the first is readily acquiesced in, and native female converts look with astonishment at the jewellery displayed on the persons of European ladies even in church, and wondering ask, 'Have they been baptized?' In regard to breaches of chastity and sins against modesty which I have noticed, it is to be observed that whatever is done on these convivial occasions is confined to their own people. The instances of Munda or Ho girls committing

themselves to acts of impropriety with males of another tribe are exceedingly rare, and such a thing as prostitution or its baneful effects is entirely unknown among them. It is, I think, true that the race generally are duller of comprehension and more difficult to teach than Hindus or Muhammadans. With the exception of those who embrace Christianity, the Mundas are usually unwilling to learn; but the Hos have of late years evinced considerable interest in education, and the progress they make is satisfactory, their anxiety to learn and wonderful diligence making up for sluggishness in intellect."

(12.) NÁGESWAR, 4200. See the Statistical Account of the Tributary Mahals of Chutiá Nágpur, where the Nágeswars are described in the detailed account of Sargújá (vol. xvii.)

(13.) NAIK, 371.

(14.) NAT, 41. A detailed notice of the Nat tribe is given in the Account of the Santál Parganás (vol. xiv.)

(15.) URÁON or ORÁON, 151,810. The division of aboriginal races into the two main groups of Kolarian and Dravidian has been explained in the introductory paragraph to this section (pp. 255–257). Colonel Dalton is of opinion that the strength of the Dravidian element in the population of Bengal has been much under-rated, and would include in the Dravidian group the Bhuiyás and Koch, and most of the broken tribes who are described as semi-Hinduised aborigines. These latter, however, have ceased to speak any dialect even remotely connected with the Tamulic languages, and the suggestion that they were originally Dravidians must remain a mere conjecture. Excluding, therefore, the semi-Hinduised races, the Uráons remain as the strongest Dravidian tribe in Bengal. The following paragraphs are quoted from Colonel Dalton's account of the Uráons given in the *Ethnology of Bengal*:—

ORIGIN.—"The Khumkh or Uráons of Chutiá Nágpur are the people known in many parts of India as Dhángars—a word that, from its apparent derivation (*dang* or *dhang*, a hill), may mean any hillmen. Amongst several tribes of the southern Tributary Mahals, the terms Dhángar and Dhángarin mean the youth of the two sexes both in highland and lowland villages, and it cannot be considered as the national designation of any particular tribe. The Uráons are found massed in the northern and western parts of Chutiá Nágpur Proper, in the eastern parts of Sargújá and Jashpur, and scattered in Singbhúm, Gángpur, Bonái, and Hazáribágh, all in the

Chutiá Nágpur Division, and in Sambalpur of the Central Provinces; but all the scattered colonies are offshoots from the nucleus of the race in the Districts first mentioned. According to the traditions I have received from the most venerable and learned of my Uráon acquaintances, the tribe has gradually migrated from the western coast of India. Some of the elders point to Gujrát as the starting-point; by others the Konkan is given as the cradle of the race (the latter derivation being adopted by the Rev. William Luther, of the Chutiá Nágpur Mission); and thence, it is supposed, is derived the name Khurnkh, by which they invariably call themselves. Uráon appears to have been assigned to them as a nickname, possibly with reference to their many migrations and proneness to roam. The people of the Konkan are called Kaunkanas in the topographical list from the Mahábhárata in the Vishnu Purán; but the affection of the Uráons for gutturals is marvellous. The Uráons all agree in this, that they were for many generations settled on the Rohtás and adjoining hills, and in Patná District; and they say that they were driven from that part of the country by the Muhammadans. But as they declare they were in Chutiá Nágpur before the birth of Phaní Mukuta Rái, the first Nágbansí Rájá, and as the present Rájá of that illustrious race claims to be the fifty-second in descent from Phaní Mukuta, they must have been under the sway of the Nágbansís before Muhammad was born. The Uráons have a tradition that when driven from Rohtás they divided into two parties. One under the chief himself went north towards the Ganges, and eventually occupied the Rájmahál hills; the other, under the chief's younger brother, went south-east. This tradition of a separation is borne out by the evident affinity in language and similarity in customs of the Uráons and Rájmahálís; and, though the latter do not acknowledge the relationship, their common origin may be considered as established. As the Rájmahálís are Málas or Málavas, it may be assumed that the Uráons are Málavas too. Leaving Rohtás they proceeded up the Són into Palámau, and, pursuing their course eastward along the Koel, found themselves eventually on the highlands of Chutiá Nágpur. They emerged on the north-western and western portions of the plateau, where they found but a few scattered colonies of the Munda race; and, according to the tradition which I have received, were permitted to settle without opposition from that people. The Rev. William Luther records that they attacked and dislodged the Mundas, who retreated

into the hills bordering on Singbhúm; but it is difficult to believe that the Uráons ever vanquished the progenitors of the Larka Kols, and after minute inquiries I do not find any such tradition in the part of the country alluded to. There are still a few Mundas in the specially Uráon quarter of Chutiá Nágpur, who are acknowledged and looked up to as the descendants of the founders of the villages in which they live. This is hardly compatible with the supposition that they were subjugated and driven out by the new arrivals. The Uráons, indeed, maintain that they were then a more advanced people than the Mundas, and that they introduced cultivation by ploughs into Chutiá Nágpur. This may be true, for the Mundas are still partial to the *dáhe* or *júm* system of tillage, so prevalent among the Indo-Chinese families.

"The Constitution of the Uráon Village is the same as that of the Mundárí. In each the hereditary *múnda* or headman, and the hereditary *páhn* or priest, have their lands on privileged terms, as the descendants of the founders of the village. The hereditary estates of the two families are called *khúnts*, and there is sometimes a third *khúnt*, called the *máhato;* on all of these a very low rent is fixed, but there are conditions of service attached. These may now be commuted to cash payments at the instance of either party. There is also, under charge of the *páhn*, the land dedicated to the service of the village gods. The priestly office does not always descend from father to son. The latter may be ignorant and disqualified, or he may be a Christian; therefore, when vacated, it is filled by divination. The magic *súp*, or winnowing-sieve, properly spelled like a divining-rod, conducts the person holding it to the door of the man most fitted to hold the office. A priest there must be; an Uráon community cannot get on without one. The fate of the village is in his hands; in their own phraseology, it is said that 'he makes its affairs.' He is also master of the revels which are, for the most part, connected with religious rites. The doctrine of the Uráons is, that man best pleases the gods when he makes merry himself; so that acts of worship and propitiatory sacrifices are always associated with feasting, drinking, dancing, and love-making. The *múnda* or *máhato* is the functionary to whom the proprietor of the village looks for its secular administration. In contradistinction to the *páhn* who makes (*banátá*) the affairs, the *máhato* administers (*chalátá*) them; and he may be removed if he fail to give satisfaction.

"In all the older Uráon villages, when there is any conservation of ancient customs, there is a house called the Dhúmkúria, in which all the bachelors in the village must, when not absent from home, sleep, under penalty of a fine. Precisely similar institutions are met with amongst the Hill Bhuiyás of Keunjhar and Bonái; and, from the notes left by the late Rev. S. Hislop, I find they are common to other Dravidian tribes. The domiciles of the Uráons have insufficient accommodation for a family, so that separate quarters for the young men are a necessity. The same remark applies to the young unmarried women, and it is a fact that they do not sleep in the house with their parents. Where they do sleep is a mystery. They are generally frank enough when questioned about their habits, but on this subject there is always a certain amount of reticence, and I have seen girls quietly withdraw when it was mooted. I am told that in some villages a separate building is provided for them like the Dhúmkúria, in which they consort under the guardianship of an elderly duenna; but I believe the more common practice is to distribute them amongst the houses of the widows, and this is what the girls themselves assert if they answer at all when the question is asked. But however billeted, it is well known that they often find their way to the bachelors' hall, and in some villages actually sleep there. I not long ago saw a Dhúmkúria in a Sargújá village in which the boys and girls all slept every night. They themselves admitted the fact; the elders of the village confirmed it, and appeared to think that there was no impropriety in the arrangement. The Dhúmkúria fraternity are under the severest penalties bound down to secrecy in regard to all that takes place in their dormitory; and even girls are punished if they dare to tell tales. They are not allowed to join in the dances till the offence is condoned. They have a regular system of fagging in this curious institution. The small boys serve those of larger growth, shampoo their limbs, and comb their hair, &c.; and they are sometimes subjected to severe discipline to *make men* of them.

"Immediately in front of the Dhúmkúria is the dancing arena, called *ákhra*, an open circus about forty feet in diameter, with a stone or post marking its centre. It is surrounded by seats for tired dancers or non-dancing spectators, and shaded by fine old tamarind trees that give a picturesque effect to the animated scene, and afford in their gigantic stems convenient screens for moonlight or starlight flirtations. During the festive seasons of the year, dancing at the *ákhra*

commences shortly after dark every night, and, if the supply of the home-brew holds out, is often kept up till sunrise. Very rakish do the dancers appear in the early morning after a night so spent. On some occasions the circus is laid down with red earth, which becomes pulverised under the many twinkling feet, and rises in a lurid cloud about the dancers, till the garments, the dusky skins, and the black hair of the performers become all of brick-dust hue. Ordinarily, on the party breaking up at dawn, they proceed from the *ákhra* to their usual avocations, and work as cheerfully and vigorously as if their night had been passed in sound sleep.

"THE DRESS of the men consists of a long narrow strip of cloth carefully adjusted as a middle garment, but in such a manner as to leave the wearer most perfect freedom of limb, and allow the full play of the muscles of the thigh and hip to be seen. They wear nothing in the form of a coat; the decorated neck and chest are undraped, displaying how the latter tapers to the waist, which the young dandies compress within the smallest compass. In addition to the cloth, there is always round the waist a girdle of cords made of *tasar*-silk, or of cane. This is now a superfluity, but it is no doubt the remnant of a more primitive costume, perhaps the support of the antique fig leaves. After the age of ornamentation is passed, nothing can be more untidy or unprepossessing than the appearance of the Uráon. The ornaments are nearly all discarded, hair utterly neglected, and for raiment any rags are used. This applies both to males and females of middle age. The ordinary dress of the women depends somewhat on the degree of civilisation, and on the part of the country in which you make your observations. In the villages about Lohárdagá, a cloth from the waist to a little below the knee is the common working dress; but where there is more association with other races, the persons of young females are decently clad in the coarse cotton cloth of the country, white with red border. Made-up garments are not worn, except by the converts to Christianity. The one cloth, six yards long, is gracefully adjusted so as to form a shawl and a petticoat. The Uráons do not, as a rule, bring the upper end of the garment over the head, and so give it the functions also of a veil, as it is worn by the Bengalí women; they simply throw the end of the dress over the left shoulder, and it falls with its fringe and ornamented border prettily over the back of the figure. Vast quantities of red beads, and a large heavy brass ornament, shaped like a torque, are worn round the neck. On the left hand are rings of copper, as many

as can be indued on each finger up to the first joint; on the right hand a smaller quantity. Rings on the second toe only, of brass or bell-metal, and anklets and bracelets of the same material are also worn. The hair is, as a rule, coarse and rather inclined to be frizzy, but by dint of lubrication they can make it tolerably smooth and amenable; and false hair or some other substance is used to give size to the mass (the chignon) into which it is gathered, not immediately behind, but more or less on one side, so that it lies on the neck just behind, and touching the right ear; and flowers are arranged in a receptacle made for them between the roll of hair and the head. The ears are, as usual with such people, terribly mutilated for decorative purposes; spikes and rings are inserted into holes made in the upper cartilage, and the lobe is widely distended. When in full dancing costume, they add to their head-dress plumes of heron feathers, and a gay bordered scarf is tightly bound round the upper part of the body.

PHYSICAL APPEARANCE.—"Although the Uráons, when young, both male and female, have countenances which are pleasant to look upon from their good-humoured and guileless expression, they must, on the whole, be regarded as a dark-complexioned and by no means well-favoured race. When we see numbers of them massed together in a market, the features that we find to predominate are excess of jaws and mouth, thick lips pushed out by the projection of the jaws and teeth, a defect which age increases, the teeth becoming more and more projecting till they appear to radiate outwards from the upper jaw. The forehead is low and narrow, but not, as a rule, receding; and the eyes have nothing very peculiar about them, often bright and full, with long lashes and straight set, sometimes small and dim but not oblique. These upper features give them an intelligent expression, notwithstanding the somewhat simian characteristics of the lower face. There is the indentation usual in the Turanian races, between the frontal and nasal bones, but the latter are more pronounced than we find them in the Lohitic tribes. The colour of the majority is of the darkest brown, almost black; but the observer may not only pick out individuals in the crowd who are of complexion as light as the average Hindu, but may find villages in which all the Uráon inhabitants are light brown to tawny. The fact is, they have to a surprising degree the faculty of assimilating their own colour and features to those of the people amongst whom they dwell; and it may be generally remarked, that when there are good-looking Aryans in the same village with Uráons, the complexions of the latter

become brighter, and the features more in accordance with a classical standard of beauty.

MARRIAGE.—"Child-marriage is not in favour amongst the Uráons. When a young man makes up his mind to marry, his parents or guardians go through a form of selection for him; but it is always a girl that he has already selected for himself, and between whom and him there is a perfect understanding. The parents, however, have to arrange all preliminaries, including the price of the damsel, which is sometimes as low as Rs.4 (8s.) In the visits that are interchanged by the negotiators, omens are carefully observed by the Uráons, as by the Mundas, and there are, consequently, similar difficulties to overcome; but when all is settled, the bridegroom proceeds with a large party of his friends, male and female, to the bride's house. Most of the males have warlike weapons, real or sham, and as they approach the village of the bride's family, the young men from thence emerge, also armed, as if to repel the invasion, and a mimic fight ensues, which, like a dissolving view, blends pleasantly into a dance. In this the bride and bridegroom join, each riding on the hips of one of their friends. A bower is constructed in front of the residence of the bride's father, into which the bride and bridegroom are carried by women, and made to stand on a curry-stone, under which is placed a sheaf of corn, resting on a plough-yoke. Here the mystery of the *sindúr dán* is performed; but the operation is carefully screened from view, first by cloths thrown over the young couple, secondly by a circle of their male friends, some of whom hold up a screen cloth, while others keep guard with weapons upraised, and look very fierce, as if they had been told off to cut down intruders, and were quite prepared to do so. In Uráon marriages, the bridegroom stands on the curry-stone behind the bride, but, in order that this may not be deemed a concession to the female, his toes are so placed as to tread on her heels. The old women under the cloth are very particular about this, as if they were specially interested in providing that the heel of the woman should be properly bruised. Thus poised, the man stretches over the girl's head, and daubs her forehead and crown with the red powder, *sindúr;* and if the girl is allowed to return the compliment (it is a controverted point whether she should do so or not), she performs the ceremony without turning her head, reaching back over her own shoulder and just touching his brow. When this is accomplished, a gun is fired; and then, by some arrangement, vessels full of water, placed over the bower, are capsized, and the

young couple, and those who stand near them, receive a drenching shower-bath. They now retire into an apartment prepared for them, ostensibly to change their clothes, but they do not emerge for some time, and when they appear they are saluted as man and wife. Dancing is kept up during their retirement, one of the performers executing a *pas seul* with a basket on her head, which is said to contain the trousseau. The Uráons have no prescribed wedding garments. They do not follow the Hindu custom of using saffron-coloured robes on such occasions. The bride is attired in ordinary habiliments, and no special pains are taken to make her lovely for the occasion. The bridegroom is better dressed than usual. He wears a long coat and a turban. Nor have the Uráons any special days or seasons for marriages. The ceremony may take place in any month of the year, but, with all natives, the hot, dry months are generally selected, if possible. There is then not much work on hand; granaries are full, and they prefer those months for marching and camping out.

"The young Uráon girls always appear on friendly terms with each other, but a custom obtains amongst them by which the ties of friendship are made almost as binding as those of marriage. It is not exclusively an Uráon practice, but it is more generally resorted to by the girls of that tribe than by other maidens. Two girls feel a growing attachment for each other. They work together, sing together, and strive to be always together, till they grow so fond, that a sudden thought strikes one or other of them to say, 'Let us swear eternal friendship.' The formula being in Chutiá Nágpur Hindí—'*Toi uor main gui jurabi amren phúl lagábi.*' Then each plucks flowers, and neatly arranges them in the other's hair. They exchange necklaces and embrace; and afterwards jointly, from their own means, prepare a little feast, to which they invite their friends of their own sex, who are made witnesses to the compact, and the ceremony is considered complete. From that hour they must never address or speak of each other by name. The sworn friend is my *gui* or flower, or something of the kind. They are as particular on this point, as are Hindu women not to mention the names of their husbands.

Dances.—"The Uráons have adopted all the Munda dances, and improved on them. They have one called the Uráon's *jádura*, which is quite a refinement on the ordinary *jádura*, most complicated in step and figure; but the movements in it are executed with wonderful precision by girls accustomed to dance it together. They commence

at a very early age to learn this accomplishment. Children may be seen practising their steps, whose powers of toddling are but rudimentary. They positively dance as soon as they can walk, and sing as soon as they can talk. Their voices are more musical than those of the generality of native children. They are naturally accurate timists, and have good ears; and the choir-singing in parts of the Uráon and Munda converts is most remarkable. They acquire with facility, and sing correctly, pieces of sacred music, that very few English parish church choirs would attempt. The tribe I am treating of are seen to most advantage at the great national dance-meetings called *játras*, which are attended by all classes of the people, but the most conspicuous groups are those that come from the Uráon, or from the Uráon-Munda villages. The *játras* are held on appointed days, once a year, at different places chosen as convenient centres. These are generally large mango groves in the vicinity of old villages, formerly the headquarters of the *barhá*, or divisional headman. On the evening preceding the gathering there is a sacrifice to the tutelary spirit, followed by a carousal in the village, and the elders of that village are sure to be all very drunk on the following morning. As a signal to the country round, the flags of each village are brought out, and set up on the road that leads to the place of meeting. This incites the young men and maidens to hurry through their morning work, and look up their *játra* dresses, which are by no means ordinary attire. Those who have some miles to go put up their finery in a bundle to keep it fresh and clean, and proceed to some tank or stream in the vicinity of the tryst grove; and about two o'clock in the afternoon may be seen all around groups of girls laughingly making their toilettes in the open air, and young men in separate parties similarly employed. When they are ready, the drums are beaten, huge horns are blown, and thus summoned, the group from each village forms its procession. In front are young men with swords and shields or other weapons, the village standard-bearers, with their flags, and boys waving yaks' tails, or bearing some poles with fantastic arrangements of garlands and wreaths, intended to represent umbrellas of dignity. Sometimes a man riding on a wooden horse is carried, horse and all, by his friends as the Rájá, and others assume the form of, or paint themselves up to represent, certain beasts of prey. Behind this motley group, the main body forms compactly together as a close column of dancers in alternate ranks of boys and girls; and thus they enter the grove where

the meeting is held in a cheery, dashing style, wheeling and countermarching, and forming lines, circles, and columns with grace and precision. The dance with these movements is called *khariah*, and is considered to be an Uráon rather than a Munda dance, though Munda girls join in it. When they enter the grove, the different groups join and dance the *khariah* together, forming one vast procession and then a monstrous circle. The drums and musical instruments are laid aside, and it is by the voices alone that the time is given; but as many hundreds, nay, thousands join, the effect is grand. In serried ranks so closed up that they appear jammed, they circle round in file, all keeping perfect step; but at regular intervals the strain is terminated by a *húrúrú*, and at the same moment they all face inwards and simultaneously jumping up, come down on the ground with a resounding stamp that marks the finale of the movement, but only for a momentary pause. One voice with a startling yell takes up the strain again, a fresh start is made, and after gyrating thus till they tire of it, the ring breaks up, and separating into village groups, they perform other dances independently till near sunset, when all go dancing home.

"The Religion of the Uráons is of a composite order. They have, no doubt, retained some portion of the belief that they brought with them to Chutiá Nágpur; but coalescing with the Mundas and joining in their festivals and acts of public worship, they have to a certain extent adopted their ideas on religion and blended them with their own. There is, however, a material distinction between the religious systems of the two people. The Mundas have no symbols and make no representations of their gods; the Uráons, and all the cognates whom I have met with, have always some visible object of worship, though it may be but a stone or a wooden post, or a lump of earth. Like the Mundas, they acknowledge a Supreme God, adored as Dharmi or Dharmesh, the Holy One, who is manifest in the sun; and they regard Dharmesh as a perfectly pure, beneficent being, who created us, and would in his goodness and mercy preserve us, but that his benevolent designs are thwarted by malignant spirits whom mortals must propitiate, as Dharmesh cannot or does not interfere, if the spirit of evil once fastens upon us. It is, therefore, of no use to pray to Dharmesh or to offer sacrifices to him; so though acknowledged, recognised and reverenced, he is neglected, whilst the malignant spirits are adored.

"I do not think that the Uráons have an idea that their sins are

visited on them, either in this world or in a world to come. It is not because they are wicked that their children or their cattle die, or their crops fail, or they suffer in body; it is only because some malignant demon has a spite against them, or is desirous of harming them. Their ideas of sin are limited. Thou shalt not commit adultery, thou shalt not steal, thou shalt not bear false witness against thy neighbour, is about as much of the Decalogue as they would subscribe to. It is doubtful if they see any moral guilt in murder, though hundreds of them have suffered the extreme penalty of the law for this crime. They are ready to take life on very slight provocation, and in the gratification of their revenge an innocent child is as likely to suffer as the actual offender. There is one canon of the Mosaical law that they in former years rigorously enforced—'Thou shalt not suffer a witch to live.' I have dwelt on this subject in treating of the Mundas [quoted in the Statistical Account of Singbhúm, vol. xvii. pp. 52, 53]. If left to themselves, the life of elderly females would be very insecure. As it is, a suspected old woman (and sometimes a young one, especially if she be the daughter of a suspected old one,) is occasionally condemned, well drubbed and turned out of the village; and she does not always survive the treatment she is subjected to. If we analyse the views of most of the Uráon converts to Christianity, we shall, I think, be able to discern the influence of their pagan doctrines and superstitions in the motives that first led them to become catechumens. The Supreme Being who does not protect them from the spite of malevolent spirits has, they are assured, the Christians under His special care. They consider that, in consequence of this guardianship, the witches and *bhúts* have no power over Christians; and it is, therefore, good for them to join that body. They are taught that for the salvation of Christians one great sacrifice has been made, and they see that those who are baptized do not in fact reduce their live-stock to propitiate the evil spirits. They grasp at this notion; and long afterwards when they understand it better, the atonement, the mystical washing away of sin by the blood of Christ, is the doctrine on which their simple minds most dwell. I have not found amongst the pagan Uráons a trace of the high moral code that their cousins of the Rájmahál hills are said to have accepted. I consider that they have no belief whatever in a future state, whilst to the Rájmahálís is attributed a profound system of metempsychosis. The Uráons carry that doctrine no further than to suppose that men who are

killed by tigers become tigers, but for other people death means annihilation. As the sole object of their religious ceremonies is the propitiation of the demons, who are ever thwarting the benevolent intentions of Dharmesh, they have no notion of a service of thanksgiving; and so far we may regard the religion of the Mundas as of a higher order than theirs. When suffering or misfortune befall a man, he consults an augur, or *ojhá*, as to the cause of his affliction, and acts according to the advice given. The *ojhá* has it in his power to denounce a mortal or a particular devil. The method employed has been described in the account of the Mundas, and the result is the same. If a fellow-being is denounced, it is said that he has caused his familiar to possess and afflict the sufferer; and the person denounced is seized and tortured, or beaten, to force him to effect the expulsion of the evil spirit. But the family or village *bhút* may be accused. The *ojhá*, under inspiration, of course, decides what is to be sacrificed, and frequently ruins, if he does not cure, the patient consulting him. In the process of propitiation, the fetish nature of the Uráon belief is shown. The sorcerer produces a small image of mud, and on it sprinkles a few grains of rice. If fowls are to be the victims, they are placed in front of this image; and if they peck at the rice, it indicates that the particular devil is satisfied with the intention of his votaries, and the sacrifice proceeds. The flesh of the animals killed is appropriated by the sorcerer, so it is his interest to have a hecatomb, if possible. In regard to the names and attributes of the devils, the Uráons who live with Mundas sacrifice to Marang Búrú and all the Munda Bongas. The Uráons on the western portion of the plateau, where there are few Mundas, ignore the Bongas, and pay their devotion to Darhá, the Sarna Burhi (Lady of the Grove), and the village *bhúts*, who have various names. Chanda or Chandí, is the god or goddess of the chase, and is always invoked preparatory to starting on great hunting expeditions. Any bit of rock, or stone, or excrescence on a rock, serves to represent this deity. The hill near Lodhma, known to the Mundas as Marang Búrú, is held in great reverence by the Uráons. To the spirit of the hill, whom they call Baranda, they give bullocks and buffaloes, especially propitiating him as the *bhút*, who when malignantly inclined, frustrates God's designs of sending rain in due season to fertilise the earth. In some parts of the country Darhá is almost the only spirit they propitiate. If fowls are offered to him they must be of divers colours, but once in three years he should have a sheep from his

votaries; and once in the same period a buffalo, of which the *ójhá* or *páhn* gets a quarter. The Uráon must always have something material to worship, renewed every three years. Besides this superstitious dread of the spirits above named, the Uráon's imagination tremblingly wanders in a world of ghosts. Every rock, road, river, and grove is haunted. He believes that women who die in childbirth become ghosts, called *chorail;* and such ghosts are frequently met hovering about the tombstones, always clad in robes of white, their faces fair and lovely, but with backs black as charcoal, and inverted feet, that is, they walk with their heels in front. They lay hold of passers-by and wrestle with them, and tickle them; and he is lucky, indeed, who, thus caught, escapes without permanent injuries.

"Towards Lohárdagá many Uráons take the name of Bhagat, the corruption of Bhakt, and attach themselves to some Bráhman or Gosáin, who gives them *mantras.* The Bhagats, without absolutely abandoning the religious observances of their ancesto have adopted the worship of Siva or Mahádeo. They have in houses, or on their premises, the usual monolithic emblem o deity, and keep brazen images of Ganesh and other Hindu The Bhagats rather discourage the unrestricted intercourse b the youth of the two sexes that their ancestors smiled upon, a do their best to keep their girls from joining in the danc ut the young men heed not the injunctions of the el t, and the girls evade them as much as possi form to Hindu notions regarding what sh lean and unclean for food; and they will not eat or drink with the people of their own tribe who are not Bhagats. I have been informed by a Christian convert, who formerly belonged to the Bhagat fraternity, that in some villages near Lohárdagá, they annually make an image of a man in wood, put clothes and ornaments on it, and present it before an altar of Mahádeo. The person who officiates as priest on the occasion says:—'O Mahádeo, we sacrifice this man to you according to ancient custom. Give us rain in due season, and a plentiful harvest.' Then, with one stroke of the axe, the head of the image is cut off, and the body is removed and buried. The Gonds make a similar offering to their Baradeo, and with them it is not always in effigy that the human sacrifice is made. There are grounds for concluding that the practice was observed by all the peoples of Dravidian origin.

FESTIVALS.—"The Uráons and Mundas keep the same festivals;

but, according to Mr Luther, the *Karm* is, with the former, the most important. It is celebrated at the season for planting out the rice grown in seed beds, and is observed by Hindus, as well as by Kols and other tribes. On the first day of the feast, the villagers must not break their fast till certain ceremonies have been performed. In the evening, a party of young people of both sexes proceed to the forest, and cut a young *karma* tree (Nauclea parvifolia), or the branch of one, bearing which they return in triumph,—dancing, and singing, and beating drums,—and plant it in the middle of the *ákhra*. After the performance of a sacrifice to the Karma Deota by the *páhn*, the villagers feast, and the night is passed in dancing and revelry. Next morning all may be seen at an early hour in holiday array; the elders in groups, under the fine old tamarind trees that surround the *ákhra*, and the youth of both sexes, arm-linked in a huge circle, dancing round the *karma* tree, which, festooned with garlands, orated with strips of coloured cloth, sham bracelets and ts of plaited straw, and with the bright faces and merry er of the young people encircling it, reminds one of the gift- tree so often introduced at our own Christmas festival, and s the probability of some remote connection between the two. Preparatory to the festival, the daughters of the headmen of the vil cultivate blades of barley in a peculiar manner. The seed is st, sandy soil, mixed with a quantity of turmeric out and unfold of a pale yellow, or primrose colo , those blades are taken up by the roots, as if for transplanting, and carried in baskets by the fair cultivators to the *ákhra*. They approach the *karma* tree, and, prostrating themselves reverentially, place before it some of the plants. They then go round the company, and, like bridesmaids distributing wedding favours, present to each person a few of the yellow barley blades, and all soon appear, wearing, generally in their hair, this distinctive decoration of the festival. Then all join merrily in the *karma* dances, and malignant, indeed, must be the *bhút* who is not propitiated by so attractive a gathering. The morning revel closes with the removal of the *karma*. It is taken away by the merry throng and thrown into a stream or tank; but after another feast, dancing and drinking are resumed. On the following morning, the effects of the two nights' dissipation are often, I fear, very palpable." Colonel Dalton notices that the *karma* festival is celebrated by Hindus as well as by the aboriginal tribes,

and quotes a passage from the Bhavishya Purána, the object of which appears to be to explain how a festival of an aboriginal people came to be adopted by the Hindus. He also points out that the necessity of the females of the family joining in the ceremony, is an argument against its Hindu origin.

"The Uráons have some observances during the Sarhúl festival that differ a little from those of the Mundas. Their idea is that at this season the marriage of Dharti, the earth, is celebrated; and this cannot be done till the *sál* trees give the flowers for the ceremony. It takes place, then, towards the end of March, or beginning of April, but any day whilst the *sál* trees are in blossom will answer. On the day fixed, the villagers accompany their *páhn* to the sarna, the sacred grove, a remnant of the old *sál* forest, in which the Uráons locate a popular deity called the Sarna Búrhi, or woman of the grove, corresponding with the Jáhir Era and Desauli of the Mundas. To this dryad, who is supposed to have great influence on the rain (a superstition not unlikely to have been founded on the importance of trees as cloud-compellers), the *páhn*, arriving with his party at the grove, offers five fowls. These are afterwards cooked with rice, and a small quantity of the food is given to each person present. They then collect a quantity of *sál* flowers, and return laden with them to the village. Next day the *páhn*, with some of the males of the village, pays a visit to every house, carrying the flowers in a wide, open basket. The females of each house take out water to wash his feet as he approaches, and, kneeling before him, make a most respectful obeisance. He then dances with them, and places over the door of the house, and in the hair of the women, some of the *sál* flowers. The moment that this is accomplished, they throw the contents of their water-vessels over his venerable person, heartily dousing the man whom, a moment before, they were treating with such profound respect. But to prevent his catching cold, they ply him with as much of the home-brew as he can drink, consequently his reverence is generally gloriously drunk before he completes his round. The feasting and beer-drinking now become general; and after the meal, the youth of both sexes, decked with *sál* flowers (they make an exceedingly becoming head-dress), flock to the *ákhra*, and dance all night and best part of next day.

Funeral Ceremonies.—"Where a death occurs in an Uráon family, it is made known by the lamentations of the women, who

loosen their hair (a demonstration of grief which appears to prevail in all countries) and cry vigorously. They lay out the body on the common cot, called *chárpái;* and, after washing it carefully, convey it to the appointed burning-place, covered with a new cloth, and escorted by all the villagers, male and female, who are able to attend. In some families the funeral procession proceeds with music, but others dislike this custom, and nothing is heard but the cries of the women. When they have arrived at the place where the funeral pile has been prepared, the body is again washed, and the nearest relations of the deceased make offerings of rice, and put rice into the mouth of the corpse, while others put pice or other coin. The body is then placed on the pile and anointed; further offerings of rice are made, and the pile is ignited by a father or mother, a wife or husband. When the body has been consumed, notice is given in the village, and there is another collection of friends and relatives to collect the charred bones which remain. These are placed in a new earthen vessel, and ceremoniously taken to the village; and as the procession returns, parched rice is dropped on the road to mark the route selected. The cinerary urn is suspended to a post erected in front of the residence of the deceased; the guests are feasted, and the party then breaks up. In the month of December or January next ensuing, the friends and relations are all again collected to witness the disposal of the bones in the place that, from the first establishment of the community, has been appropriated to the purpose. This is a point on which the Uráons are exceedingly tenacious; and even when one of them dies far from his home, his relations will, if possible, sooner or later, recover the fragments of his bones, and bear them back to the village, to be deposited with the ashes of his ancestors. The burial-ground is always near a river, stream, or tank. As the procession proceeds with music to this place, offerings of rice are continually thrown over the cinerary urn till it is deposited in the grave prepared for it, and a large flat stone placed above. Then all must bathe, and after paying the musicians, the party returns to the village. The money that was placed in the mouth of the corpse, and afterwards saved from the ashes, is the fee of the musicians. The person who carried the bones to the grave has to undergo purification by incense and the sprinkling of water. It is to be observed that this ceremony occurs in each village but once in the year; and on the appointed day the ashes of all who have died during the year are simultaneously

relegated to their final resting-place. No marriage can take place in a village whilst the bones of the dead are retained there. The most ardent lovers must patiently await the day of *hadbári* or sepulture. The marriage season commences shortly afterwards.

CHARACTER, &C.—"The Uráons, if not the most virtuous, are about the most cheerful of the human race. Their lot is not a happy one. Not one of their own people now occupies a position which would give him the power to protect, or the influence to elevate them from the state of degradation into which a majority of the tribe have long fallen. They submit to be told that they were especially created as a labouring class. They have had this so often dinned into their ears, that they believe and admit it; and I have known instances of their abstaining from claiming, as authorised by law, commutation for the forced labour exacted by their landlords, because they considered that they were born to it. There are indeed some amongst them, stern yeomen, who cling with tenacity to the freeholds they have inherited, and will spend all they possess in defending them; but the bulk of the people seldom rise, in their own country, above the position of cottiers and labourers. There the value of labour has not risen in proportion to the advance that has taken place in other parts of India; and Uráons are easily induced to migrate for a time to other climes, even to regions beyond the great 'black water,' where their work is better remunerated. But those who return with wealth thus accumulated regard it not. They spend in a month what would have made them comfortable for life, and relapse into their lot of labour and penury, as if they had never had experience of independence and plenty. I believe they relish work, if the task-master be not over-exacting. Uráons sentenced to imprisonment without labour, as sometimes happens, for offences against the excise laws, insist on joining the labouring gangs, and wherever employed, if kindly treated, they labour as if they felt an interest in the work. In cold weather or hot, rain or sun, they go cheerfully about it; and after some nine or ten hours of toil, they return blithely home, in flower-decked groups, holding each other by the hand or round the waist, and singing. When I first saw them, this struck me as a very noteworthy characteristic; for, as a rule, the working classes of all countries, especially those of India, move unsociably in single file. It is only people of fine organisation and gentle nurture, and the aborigines of Chutiá Nágpur, who voluntarily walk abreast and linked together in line. The Uráons have

acquired this habit from their naturally genial dispositions, and their dancing drills and parades."

(16.) PAHÁRIÁ, 35. The Paháriás are treated of at length in the Account of Mánbhúm District (vol. xvii.)

(17.) PARHEYÁ, 2965; of whom all but thirty-four are found in t Subdivision of Palámau. Colonel Dalton writes of them as follows "The people in Palámau called Parheyá appear to be the m remnant of a tribe who, according to their own traditions and traditions of other races in the District, once formed an importa section of the population. I have little to say about them. The are one of the numerous tribes, or perhaps, it might be more correctly stated, one of the branches of the great tribe who, with Turanian features and many corresponding customs, have adopted Hindí as a language, to the obliteration of all their primitive forms of speech; and who, though affecting Hindu customs, retain practices that are in the eyes of Hindus impure and abhorrent. Their marriages and funeral ceremonies are Hindu. In the former, the red powder called *sindúr* is used, the bridegroom sealing the compact by touching and marking with it the forehead of his bride. The Kolarian races who have adopted the custom show their superior appreciation of female dignity by requiring an interchange of the process, the bride respectfully returning the compliment by similarly marking her husband. The Hinduised tribes do not allow her to take so active a part in the ceremony. The Palámau Parheyás have retained the adoration of sylvan deities, Dharti and Gohet. These gods dwell in the hills, and delight in the blood of goats. I have noticed considerable variety of features amongst the Parheyás. Of four I had before me at Rámkúnda, in Palámau, two might have been classed as Negro, two as Mongolian. The two former were dark and pro-gnathous; the latter bright copper-coloured, with flat, broad faces and slightly oblique eyes."

Mr Forbes's account of them, in the "Settlement Report of Palámau," is quoted below, as his description of their marriage ceremonies differs in some particulars from that given by Colonel Dalton. "The Parheyás are a Hindu-speaking aboriginal tribe, found in tolerable numbers in the more jungly parts of *parganá* Palámau. In their habits and customs they present a curious mixture of the Hindus and the aborigines; they are certainly not pure Mundas, but they may be Kaukus, who are a branch of the Munda family. They differ so much in personal appearance, that it is

difficult to assign to them any distinct physiognomy. I have seen many of them that might almost be mistaken for Kawárs; while others are a tall, fair, handsome race of men, with features rather Aryan than otherwise, and so athletic and powerful, that the expression 'as strong as Parheyá' has almost passed into a proverb. These have none of the Negrito stamp about them. Many of them are to be found residing in the plains, but they generally choose the wild jungly villages, and reside in a separate *tolá* or hamlet. The herders and many of the *rayats* of the Government farm of Kechki are Parheyás, and are very good cultivators; but the majority of the tribe, like the Brijiás, live in the hill ranges and roam about from spur to spur, clearing small patches of ground and cultivating a few hardy crops. They also bring down to the plains honey, beeswax, *dhuná*, lac, and other jungle produce, which they barter for grain, salt, tobacco, and cloth. Most of them have Bráhmans as *purohits* or priests, and employ the barber at marriages. Hindus of every class will drink water from their hands, and eat any food but rice that has been cooked by them. The Parheyás themselves, strange to say, carry their Hindu prejudices so far that they will not eat *ghí* which has been kept in a *kupá* made of cow-hide. They always smear their cooking-places with cow-dung, and eat barefooted like the Hindus. They know nothing whatever of their former history; in fact, the only ancient custom of the tribe that I have been able to discover is that they formerly held deer and sheep sacred, and used the manure of those animals where they now use cow-dung. Notwithstanding their affectation of Hinduism, they still adhere to many of their old customs, which decidedly point to their origin. Marriage rarely takes place before the age of puberty. In their wedded life they are chaste and moral; before this takes place, the intercourse between the sexes is unrestricted. They never marry out of their tribe, and any woman found misbehaving herself with a man of an alien tribe, is at once outcasted, and so with the men. Notwithstanding the employment of Bráhmans and barbers, their marriage ceremony is simple and decidedly aboriginal. I have never witnessed one of their marriages, and am unable therefore to describe all that takes place; but the principal part of the ceremony consists in pouring *ghí* or oil upon the forehead of the bride, and allowing it to run down the face. If it trickles from the centre of the forehead straight down the ridge of the nose, the fates are propitious, and the marriage will be a happy one; if, on the other

hand, the *ghí* or oil trickles down to the right or left, it is a sign that the girl will either shortly die or prove unfaithful, and very often in this case the marriage is broken off and the maiden has to wait till another seeks her hand."

(18.) PURÁN, 3375; are confined to Chutiá Nágpur Proper. They, with the Kharriás, claim to be the aborigines of Morbhanj, one of the Cattack Tributary Mahals. They say that they and the family of the chief (Bhanj) were produced from a peafowl's egg: the Bhanj from the yolk, the Puráns from the white, the Kharriás from the shell.

(19.) RAUTIÁ, 16,387; are also found only in Chutiá Nágpur Proper. Colonel Dalton thinks they are probably connected with the Gonds, and therefore of Dravidian origin. They were introduced at an early period by the Nágbansí Rájá of Chutiá Nágpur to aid him against his Kol subjects, and obtained grants of land as military colonists, which their descendants still hold. "They resemble the Gonds in feature and in disposition; but as they aspire to be of Aryan descent, have lost all trace of their original language, and follow the customs of Hindu Súdras, it is impossible to be certain of their affinities. They made their first appearance in a place called Panári; and though now scattered, they still maintain there a Rautia *páhn* or *baigá*, *i.e.*, priest, who performs for the tribe the worship of their tutelary deity called Mahadán, whom I take to be the same as the Bura Deo of the Sargújá and Singbhúm Gonds, and Bada Deo and Badial Pen of the Southerners."

(20.) SANTÁL, 1204; only found in Chutiá Nágpur Proper. For a full notice of the Santáls see the Statistical Accounts of the Districts of Hazáribágh (*ante* pp. 65–74) and the Santál Parganás (vol. xiv.).

(21.) BRIJIÁ. The following notice of the Brijiá, a tribe not mentioned in the Census Report of 1872, but found, according to Mr Forbes and Colonel Dalton, in the south and west of Palámau Subdivision, is condensed from Mr Forbes's Settlement Report. In the experimental Census of Palámau, conducted by the police in 1869, the numbers of the tribe were ascertained to be 545, of whom 255 were Brijiás and 290 Agoriás. These two divisions intermarry, and observe similar customs, the only difference between them being that the Agoriás smelt iron and the Brijiás do not. Mr Forbes collected a small vocabulary of the Brijiá language, on which Colonel Dalton bases his opinion that they are of pure Kolarian origin. They have

no traditions, and disclaim kinship with any other tribe. A few have entered the villages of the level valleys in the south of Palámau, and have become decent cultivators; but the bulk of both divisions of the tribe live in groups of two or three families on the ...urs of the highest hills. By cutting the forest and burning the ...wood, they clear a small space of ground on the top of the ...ere they have fixed their home for the year. On this land ...ltivate a few scanty crops of *rahar*, *til*, *urid*, *bodi*, *tusáru*, and ...nes castor-oil. They use neither plough nor hoe, but plant ...eeds in small holes drilled with a pointed bamboo. The crop ... supplies their own wants, and is never brought to market; ...ey pay a *maund* or two of grain by way of rent to the pro... or of the village within the boundary of which their hill is ...ated. The same hill is seldom occupied for two successive ...sons. They collect lac, beeswax, and honey, besides an ...mmense variety of jungle roots. The three former, and some of the latter, are brought down to the plains and bartered for grain, salt, and tobacco. The jungle roots and herbs are also largely used for food. Neither Brijiás nor Agoriás bear any marked resemblance to the Kolarian tribes. Their features are usually long, noses pointed, cheekbones large, and eyes sunken. Some of them wear beards. The women, however, resemble the Mundas, particularly when they are young. Their only idea of religion appears to consist in the worship of deceased ancestors, in whose honour sacrifices called *muá* are offered on certain days of the year. Marriage rarely takes place before the age of puberty, and the ceremony is extremely simple. The father of the bridegroom sends a younger brother or a friend to the girl's father to demand her in marriage. This ambassador is called *água*, and his duty is to receive from the bride's father a customary payment of Rs. 4 (8s.), and to arrange for the marriage feast. At the appointed time both families meet at the bride's house, and the rejoicings are kept up for several days. The marriage is consummated on the first night, and the married couple rejoin the feast next morning. The Brijiá dances are like those of the Uráons, but somewhat quicker and more energetic. The men wear peacock's feathers on the head and over the shoulders as they dance, with a large bunch fastened on behind and hanging down like the tail of the bird. The women have their hair simply decorated with flowers. Their songs are considered by Mr Forbes to be more melodious and less monotonous than those of

the Uráons. Most of them are simple love tales; but some are evidently the old war-songs of the tribe, and one in particular relates the resistance they made to the invasion of Palámau by the Cheros or Rájputs. This song, which Mr Forbes gives in Hindí, in an appendix to his report, mentions the name of Deo Sáhi, Rájput Rájá of Daudand in the District of Sháhábád; a burden of each verse is, "Retire, retire; Deo Sáhi is com cannot resist him."

HINDU CASTES.—The following is a list of seventy-seven castes in Lohárdagá District, arranged as far as possible accordin order of precedence which they hold in local esteem, and show occupation of each caste. The numbers are taken from the C Report of 1872:—(1) Bráhman, 27,326; priests, landholders, and isterial officers under Government. For Colonel Dalton's comm upon the Bráhmans of the Chutiá Nágpur Division generally, s the Account of Hazáribágh District (*ante* p. 75). Mr Forbe writes that the four chief Bráhmanic *gotras* or septs in Palámau are the Sakaldwípí, Kanaujiá, Sarwariá, and Jyotishi. The two former are the most numerous, and are about equally represented. Living among a population of aboriginal races and broken tribes, the Bráhmans of Palámau, whose entry into the *parganá* probably dates from the rise of the Cheros, are as a body extremely ignorant. Although most of them act as spiritual teachers and priests, they are ill-informed as to their own doctrines, and very few can even read or write. Many estates in Palámau are held by Bráhmans both on rent-free and service tenures; but owing to their practice of dividing their lands equally among their children, there is no great wealth among them. Their estates are subdivided into almost infinitesimal quantities, a share consisting sometimes of no more than a few square yards of land. They are, however, good cultivators, and some of the poorer among them actually hold the plough. Socially, they are exceedingly quarrelsome and grasping; but some of them are kind and considerate landlords. Many take service and act as farm-agents, herdsmen, and domestic servants. (2) Chhattrí or Rájput; landowners and servants, mostly well off; 37,744. A large proportion of the ostensible Rájputs of Lohárdagá are, no doubt, sprung from aboriginal races, and have but little Aryan blood in their veins. The chief Rájput families of Chutiá Nágpur are the Nágbansí, Sikhar, and Ráksel, who are acknowledged to be o good family, and intermarry with the best; though Colonel Dalton

thinks that none of them, except the Ráksel, can trace their descent out of the Province. On the general character of the Rájput landlords, Colonel Dalton writes as follows:—"Very good specimens of country gentlemen may be found amongst the Rájput landlords of Western Bengal. Where, as is sometimes the case, primogeniture is the local custom or family usage, and estates have been long in the same family, the best relations generally exist between the landlord and the peasantry. Indeed, it will be found that a very indifferent landlord is, in such estates, more respected and beloved than the most indulgent new man. Good or bad, they live among their own ... 'like the fine old English gentleman.' They may fleece the ... sometimes when they levy contributions for marriages, or ... themselves for some act of needless extravagance; but ... ever tends to the dignity of the family, the people deem ... selves personally concerned and give without demur ... satisfaction to them when the duties of hospitality are religiously ... erved by their chiefs. The objects of their charity are often ... reverse of worthy, but still 'the poor seldom pass unrelieved ... their gates.' The class of native gentlemen that I speak of ... not the inert sensualists that wealthy Bengalís so often become; ... y are fully capable of enjoying field sports; they generally ride well, and are good shots and keen sportsmen. They are sure to have a good battery of guns by the best English makers, good horses, dogs, elephants, and hawks, and even fishing-tackle. It is true that a Rájput claiming to be one of the twice-born is bound to study the Vedas, and to perform most of the religious duties that are enjoined on Bráhmans. I know some Rájput gentlemen who, acting up to the Bráhmanas or sacred precepts, spend a great part of the day in devotion, such as it is; but the Bráhmans are, after all, the most indulgent and accommodating of religious guides. Any Rájput gentleman who finds the observances prescribed tedious or irksome, *may hire a Bráhman to do it all for him.* The Rájput may be shooting or hawking whilst it goes on—the result is the same, so far as his spiritual welfare is concerned." Mr Forbes says that most of the wealthier landlords of Palámau are Rájputs; the leading family among them being the Námudág, who are Sarwariá Rájputs, and are usually appealed to ... caste dissensions. The Thákuráits of Ranka and Chainpur are ... so Sarwariás, and are descended from the family of the *diwán* or chief ministerial officer under the old Chero ruler. The heads of

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both these families did good service in the Mutiny, and received from Government the title of Rái Bahádur, besides *khiláts* or dresses of honour, and rent-free lands. All the Rájput families of Palámau have intermarried freely with the Cheros and Kharwárs, and the poorer classes among them have very much degenerated in appearance. The Rájputs are good cultivators, and think very highly of ownership in the soil. As petty landlords, they are generally oppressive and overbearing; and Mr Forbes attributes most of the insurrections of the Cheros and Kharwárs to their wish to throw off the Rájput yoke. (3) Khandáit, 322; found only in C[illegible] Nágpur Proper. They are noticed in detail in the Sta[illegible] Account of Singbhúm (vol. xvii. pp. 63, 64), where they numb[illegible] than 2000. The Singbhúm Khandáits are almost certai[illegible] grants from Orissa, and th[illegible]handáits of Chutiá Nágpur are shoot from the Singbhúm colony. (4) Baidya; hereditary physic[illegible] but many have abandoned their caste employment and betaken the selves to agriculture; 729 in number. (5) Káyasth; landown[illegible] writers, and clerks in Government and private employ; number 4[illegible] (6) Bandáwat; wear the *janáo* or sacred thread, and claim to Rájputs, but they are described by Colonel Dalton as cultivato[illegible] number, 8. (7) Bábhan or Báhman; landowners and cultivato[illegible] fairly well off; number, 5786. The Báhmans of Palámau make no claim to be either Sarwariá or Sakaldwípi Bráhmans, like their brethren in Behar, but call themselves Rájputs. The general belief in the Subdivision is that they descended from certain Súdras who were raised to military rank, and the following curious legend of their origin is quoted by Mr Forbes:—"A Rájá of Mathurá, named Kansa, went to fight against Krishna, his own nephew, and was killed. Jará Sindhu, father-in-law of Kansa's daughter, on hearing this, went with a great army to fight Krishna. He was defeated, but tried seventeen times with the same ill success; and the eighteenth time made a vow that if he was successful, he would, on his return home, feed 108,000 Bráhmans. On this occasion he was successful, and had to act up to his words. Bráhmans were called in by hundreds and thousands, fed, and sped on their way, but still the number fell far short of his rash vow. His two *diwáns*, to whom the duty of collecting the Bráhmans was intrusted, were driven to their wits' end; not knowing what to do, they at last hit upon the expedient of bringing in low-caste men from all parts of the country, and having adorned them with the Bráhmanical cord, presented them to the Rájá as

Bráhmans. Doms were called in and presented as Dom-kattár Bráhmans, the name being suggested by the knife, universally used by Doms for cutting bamboos, called *kattár*. Some were named after the village in which they resided, men from the village of Sonbhardá being called Sonbhárderiá Bráhmans, and so forth. The Rájá at last grew suspicious at all these new Bráhmanical orders, and directed his two *diwáns*, who were Amastha and Srí̃basthab Káyasths, to eat with all persons they brought in; and this accounts for these two divisions of the Káyasths eating with Bráhmans." (8) Bhát; heralds and genealogists; 1334. (9) Doglá or Krishna-pakshi is a name applied to the sons of the higher classes by women of low caste. They appear to have found employment chiefly as writers; number, 141. (10) Agarwálá; traders; 977. (11) Márwárí; merchants and traders, mostly Jains; 33. This name clearly denotes a nationality rather than a caste. (12) Nápit or Hajjám; barbers; 11,739. (13) Kámár; blacksmiths; 30,515; with the subdivision of Dojiá, numbering 1481. The blacksmith caste, which is reckoned pure in Bengal, is impure in Behar, owing perhaps to the large aboriginal element which it contains in the latter Province. (14) Kumbhár; potters; 15,589. (15) Telí; oil-pressers and sellers; 24,427. (16) Támbulí; growers and sellers of betel leaf; 1233. (17) Báruí; follow the same occupation as the preceding, though it is said that the Báruí are the growers, and the Támbulí the sellers, of betel; number, 3183. (18) Sadgop; cultivators; 69. (19) Málí; gardeners; 5205. (20) Baniá; traders; 1725. The following are subdivisions of the Baniá class:—Barnawar, 51. Dhusár, 1104. Gandhabanik, 5035. Jamanpuri, 37. Jaswar; a somewhat inferior class of Baniás, who are lax Hindus, and permit their widows to remarry; number, 335. Kasandhan, 198. Kasarwání, 322. Khatrí, 113. See the Statistical Account of Hazáribágh (*ante* p. 77). Lohandia; a well-to-do class of iron-smelters, 66. Mahurí, 2. Nuniyár, 2729. Rástogi, 12. Sinduria, 275. (21) Kánsárí; braziers; 2068. (22) Sánkhárí; shellcutters; 153. (23) Aguri; a Bengal caste, identified in the Census Report with the Ugrakhetri of Manu. They are engaged in agriculture and trade, and possibly made their way into Lohárdagá from the District of Bardwán; number, 1678. (24) Goálá; cowherds and milkmen; 20,794. In the Census Report, Ahir, numbering 39,340, and Mahákul, 299, are given as subdivisions of the Goálás. Mr Forbes, however, writing of Palámau, says that no distinction is there recognised between Ahir and Goálá; and that a man will describe himself in-

differently by either name. Many of the Palámau Goálás are wealthy, and own large numbers of cattle, and a few are farmers of land or mere cultivators; but the greater portion are simply herdsmen, and live by the percentage they receive on the quantity of *ghí* obtained from the herd under their charge. The owners of the cattle do not rely on their herdsmen to give in the proper produce, but send a trustworthy agent once a fortnight, or once a month, to test the quantity of milk that the buffaloes yield. The amount thus ascertained for one day is what the herdsman has to account for daily until the next visit; and the amount of *ghí* obtained from a *ser* of milk is tested in the same way. The Goálás in service lead a wandering and hard life, as the grazing-grounds of the larger herds have to be changed twice a year. At the approach of the hot weather they drive off their cattle to the tablelands of Sargújá, or even as far as Udaipur and Singrauli, returning as the rains set in to the rich low grounds of Palámau Subdivision. As a class, the Palámau Goálás have the reputation of being very dishonest, and the offence of cattle-stealing is, no doubt, common among them. (25) Halwái; confectioners; 2995. (26) Kándu; prepare *chirá* and *khi* or parched rice; 5056. (27) Gonr; a subdivision of the foregoing; 3513. (28) Garerí; shepherds; 3124. They are probably an offshoot of the Goálás, though the two castes do not intermarry. Together with their occupation of tending sheep, they carry on that of making blankets. In common with the other pastoral tribes, they observe the custom that when an elder brother dies the next in age marries his widow. (29) Kaibartta; agriculturists; 584. (30) Chásá Dhobá; cultivators; 74. (31) Vaishnav; followers of Chaitanya, a religious reformer in Nadiyá, who lived in the beginning of the sixteenth century; number in Lohárdagá, 4459. A detailed account of this sect is given in the Statistical Account of the Twenty-four Parganás (vol. i. pp. 65–67, and 72–73). (32) Baráik; a subdivision of the Koerís, and, like them, cultivators of garden produce; 4034. (33) Káhárs; cultivators, palanquin-bearers, and servants; 22,526, of whom more than 19,000 are found in Palámau. Mr Forbes describes them as generally good cultivators, and enumerates four divisions, Rawáni, Gaiwára, Dhus, and Kharwára. The first three are well known; but the last is confined to the jungle districts of Western Bengal, and Mr Forbes believes that they are not really Káhárs but Kharwárs, who accepted the domestic services performed by genuine Káhárs, and were accord-

ingly transformed into Kharwára Káhárs. (34) Behárá; l
bearers, probably a Bengal caste; 157. (35) Sakiár; grow, p
and sell *gur* or molasses. Colonel Dalton suggests that they may
tribe of Koerís, and not a distinct caste. Number in Lohárdagá, 16

(36). Koerí; independent cultivators, and growers of opium, sugar-cane, and garden produce; number, 20,198. The following is quoted from Colonel Dalton's *Ethnology of Bengal*:—"The distinction between the Koerís and Kurmís is, that the former are generally market-gardeners as well as agriculturists. They rear vegetables, tobacco, opium, and other produce that requires more careful cultivation than the staple crops; but they are also good agriculturists as well as gardeners. The Koerís are generally allowed to be *Satsúdras, i.e.*, pure Súdras. Their own tradition is, that they were produced specially by Mahádeo and Párvatí for the gardens of the holy city of Benáres. They observe the Bráhmanas more strictly than most Súdras and inferior castes. Six months after birth the first food is given to a child by a Bráhman from rice, *mahápraśád*, that has been offered to idols. At the age of five or six, boys and girls have their ears pierced by the *guru*, or spiritual guide, who is a Sanyásí Gosáin, not a Bráhman, and the *mantra* is at the same time given; but as the child does not always recollect the mysterious words imparted to him, they are repeated to him when he grows older. No other ceremony occurs till marriage, which takes place when the boy is ten to twelve, and the girl seven to ten. The preliminaries are first arranged by mutual friends, who meet at the house of the bride. If they come to an agreement, small sums of money are interchanged. The boy's friends give four *ánnás* and a half, and the girl's friends one *ánná* and a half, and this is an engagement. But as a betrothal it is incomplete, till the ceremony called *sugan bándhná* is performed. Ten or more of the boy's friends, with music and a Bráhman, go to the girl's house; her friends are also invited, and the ceremony commences by the father of the girl and the father of the boy each spreading a new cloth on the ground. The Bráhman then takes some *dhán*, or paddy, from the store of the bride's father, and places it in the hands of the maiden, who throws it on the cloth spread by her father-in-law that is to be. The Bráhman next takes some grain that has been brought from the bridegroom's house, and this is thrown on the cloth spread by the father of the maiden. The cloths are then rolled up with the grain in them, and the bride retains that which was brought from the house of her betrothed;

friends of the latter take away the cloth produced by the father. Eight days after the above ceremony the marriage is place. A Bráhman priest presides, and the service is strictly Bráhmanical. At the conclusion of the orthodox ritual, the bride and bridegroom, their scarves tied together, are made to perform seven times a circuit round a collection of vessels containing water, grain, oil, and a light. This is called the *bhanwar*. The girl goes first; she carries one of the cloths with grain, and the boy the other; allowing the grain to drop, they thus mark the circuits they make. When all is over the boy is taken into the women's apartments and invited to eat, but he will not touch food till a present is made to him. In the same manner, when the bride first appears amongst the females of her husband's house, she obstinately declines all refreshments till bribed to eat. The *jaház* is used by the Koerís as well as by the Kurmís. Widows may marry again, but for such a union the full marriage ceremony is not needed; an interchange of gifts and the presentation of the *sindúr* is all that is requisite. This is called *sagai*. The offspring of such a marriage are considered legitimate. It is usual for a younger brother to take his elder brother's widow, unless she objects. The *grám deotás*, village gods, of the Koerís, at least of those that I have met with, are Sukha, Parameswarí, and Mahávíra or Hanumán. Altars to these three are in each house; one altar to all three and a plant of *tulsí* in the courtyard. They keep the Hindu festivals of *Janmáshtamí* and the *Sivarát*. Like many other Hindus settled in Chutiá Nágpur, they also observe the aboriginal festival of *Karma*; and every three years they make offerings on a hill known as the Marang Búrú, the god that is invoked by the aborigines, especially when rain does not fall in due season."

(37) Kurmí; the great agricultural caste of the Chutiá Nágpur Division. A full notice of them is given in the Statistical Account of Mánbhúm (vol. xvii.) Number in Lohárdagá, 35,688. (38) Panda; cultivators; 5478. (39) Sárak; cultivators; 1659. The Sáraks are said to have been Sráwaks or secular Jains, who were converted to Hinduism and took to agriculture. (40) Tántí; weavers; 5837. (41) Sonár; goldsmiths, considered a pure cast in Behar; 3302. (42) Subarnabanik; the goldsmith caste of Bengal, held to be impure; 2736. (43) Barhi; carpenters; 6366. (44) Bháskar; stone-cutters; 18. (45) Chitrakar; painters; 60. (46) Láheri; workers in lac; 489. (47) Sikalgir; cutlers; 11. (48) Páik; landowners and cultivators; 1397. (49) Dhobí; washermen; 8612. (50) Dhanuk

cultivators; 2107. Mr Forbes describes the Dhanuks of Palámau as free agriculturists who pretend to great purity. Buchanan speaks of them as "a pure agricultural tribe, who, from their name, implying archers, were probably in former times the militia of the country. They are perhaps not essentially different from the Kurmís, for any Jasawar Kurmí, who from poverty sells himself or his children, is admitted among the Dhanuks." (51) Beldár; labourers; 828. In Behar the Beldárs form a distinct caste, and though frequently associated with Nuniás, do not intermarry with them. They are also known as Khátáwás. (52) Kakberi; labourers; 118. (53) Nuniyá; labourers; described by Mr Forbes as the navvies of the Palámau Subdivision. They work by contract. Number in Lohárdagá, 2635. (54) Sunrí; spirit-distillers; 9984. (55) Ghátwál; guardians of the hill passes; number only 145 in Lohárdagá, all of whom are probably immigrants from Hazáribágh District. In Palámau Subdivision there are no Ghátwáls. They are, for the most part, Bhuiyás by descent, who have converted the official title of *ghátwál* into a caste appellation. (56) Dhuniá; cotton-carders; number, 137. The Dhuniás are included by Mr Forbes in his list of Muhammadan sects found in Palámau, and the Dhuniás of Behar are described as Muhammadans in the Census Report. It is possible, however, that Hindu weavers may have adopted the name, as they have done in Bhágalpur with the purely Musalmán title of Juláhá. (57) Jugí; makers of silk string; 540. (58) Kapáli; weavers of gunny cloth; 174. (59) Kashtá; weavers; 397. (60) Patuá; makers of silk thread on which they string beads; 2079. (61) Durihará; string-makers; 733. (62) Khátik; sellers of onions and chillies; 26. (63) Porit; fish and vegetable sellers; 129. (64) Bathuá; boatmen, described in the Census Report as a subcaste of Málás; 16. (65) Jáliá; fishermen and boatmen, said to be a branch of Kaibarttas; 99. (66) Keut or Kewat; boatmen, taking their name from the Hindí *kená*, to row; 678. (67) Malá; the great boating and fishing caste of Behar; 7250. (68) Pátní; ferrymen; 16. (69) Pod; fishermen; 271. The Pods have a Turanian type of feature, and are said to be an aboriginal race descended from the Paundras, who inhabited Bengal in the age of the Mahábhárata. (70) Tior; fishermen and boatmen; 761. (71) Báiti; musicians, probably an offshoot of the Dom and Chamár castes; 163. (72) Bájaniá; dancers; 67. (73) Gandharb; the ordinary Hindu prostitute caste; 15. (74) Gulguliá; 4. This caste has already been noticed in the Statistical Account of Hazáribágh (*ante* p. 81), as,

although not separately enumerated in the Census returns of that District, it was mentioned in the list of castes furnished by the Deputy Commissioner. They are a vagrant tribe, who live by begging, pilfering, exhibiting monkeys and goats, and gleaning up what is left on the ground when the crops are cut. Some of them are said to conceal their profession under the garb of a *sanyásí* or religious mendicant. They do not live in villages, but build small hovels of reeds and leaves on the outskirts. The women sell drugs, and pretend to cure toothaches, earaches, and barrenness. Gulguliás will eat the leavings of all other castes, except the Dhobís or washermen. They are said to speak a peculiar patois or thieves' slang, understood only among themselves; and it is believed that to this circumstance they owe their name of Gulguliás, or "chatterers." (75) Pawariá; dancers; 32.

Besides the foregoing, two low Hindu castes, not separately recorded in the Census, are mentioned by Mr Forbes in his "Report on Palámau." (76) The Tetwas are a caste of musicians and weavers, apparently not connected with the Tántís. A few families of them were found in Palámau Subdivision at the time of the Experimental Census of 1869. (77) The Bangalas are a tribe of wandering gipsies, distinct, however, from the Nats or Bázígars. They come chiefly from the banks of the Ganges, and travel about the country in parties of from ten to fifteen, generally having with them one or two fine bulls, on which they pack their goods. These animals are trained to assist in the snaring of birds and small game. Bangalas are expert thieves, and are said to make a trade of kidnapping. They sell porpoise-oil, and live in small tents made of a reed called *sirki*, which they put together so neatly as to be perfectly water-tight. The women of the tribe are professional tattooers, and are employed by all the Hindu castes. Mr Forbes considers the Bangalas distinct from the Nats; but the habits of the two appear to be extremely similar, and one of the ordinary names of the latter is *Sirki-básh*, or dwellers in reed huts of the kind used by the Bangalas.

Semi-Hinduised Aborigines.—The following list of Semi-Hinduised aborigines is arranged, as far as possible, in order of precedence; but where all rank so low in the Hindu social system, it is difficult to determine precisely the relative status of particular classes:—(1) Chandál; described in the Census Report as the great sweeper caste, to which was consigned the bulk of the aboriginal tribes who embraced Hinduism in Bengal. They number only 217 in Lohár-

dagá District, of whom none are found in the Palámau Subdivision. All of these are probably immigrants from Bengal. (2) Karangá; 36. The Karangá appear in Mr Magrath's District Statement, but there is no mention of them in the General Census Report, in Dalton's *Ethnology*, Mr Forbes' "Report on Palámau," Sir George Campbell's *Indian Ethnology*, or in the returns of the Deputy Commissioner. (3) Chik; one of the helot weaver castes, which form a conspicuous feature in the Chutiá Nágpur Division. Further reference is made to this subject in the Statistical Account of Singbhúm District. In feature, the Chiks, like the other weavers, are Aryan or Hindu rather than Kolarian or Dravidian. They repudiate the Hindu restrictions on food, but worship Hindu deities, and have no peculiar customs to connect them with the aboriginal races. Number in Lohárdagá, 12,387, only 72 of whom belong to Palámau. (4) Bind; fishermen and tank-diggers, only found in Palámau; 236. (5) Mál; 950. For a full notice of this caste see the Statistical Account of Mánbhúm (vol. xvii.) (6) Shikárí; hunters; 30. (7) Bágdí; fishermen, palanquin-bearers, and general labourers. Colonel Dalton describes them as the remnant of an aboriginal race, who, by intermarriage with low-caste Hindus, have nearly effaced their primitive lineaments. It is suggested in the Census Report that they may possibly be allied to the Báuris, who are found in the same localities. The Bágdís are confined to Chutiá Nágpur Proper, where they number 532. (8) Bhuiyá; 45,008. See the Statistical Accounts of Hazáribágh (*ante* p. 79) and of the Tributary Mahals of Chutiá Nágpur, for a fuller notice of this tribe. (9) Báurí; are joined by Colonel Dalton with the Bágdí (No. 7 *supra*), as the remnant of an aboriginal race which has lost its typical features by intermarriage with low-caste Hindus. He also considers that the fact of Báuris being still in possession of *ghátwálí* tenures as ancestral, shows that they once had a proprietary interest in the soil. They are gross feeders, but lose their caste if they eat a heron or a dog. The heron is the emblem of the tribe; and they account for the sanctity of the dog by saying that they found it necessary to have a sacred animal, and chose the dog because he was useful when alive, and not nice to eat when dead. (10) Dom; basketmakers and general scavengers; 5395. Turí; a subcaste of Dom, who also engage in fishing; number, 4551. (11) Dosádh; cultivators, village watchmen, and servants. Mr Forbes writes that the Dosádhs of Palámau are very numerous. They are divided into several classes, and are to be found in almost every

village either as cultivators or watchmen. There are some wealthy and respectable families among them; but the majority are too indolent to accumulate wealth honestly, and have the character of being inveterate thieves. In Palámau, as elsewhere, they worship the demon Ráhu. The peculiar character of their ritual is explained in the Statistical Account of Hazáribágh (*ante* p. 80). Number in Lohárdagá, 25,233. (12) Banjárás; described by Wilson as a numerous tribe, of obscure origin, extending along the foot of the mountains from Haridwár to Gorakhpur, and comprising both Hindus and Muhammadans. They are said to be connected with the Bháts, and to enjoy similar privileges, their persons being held sacred, and accepted in guarantee of engagements. Number in Lohárdagá, 58. (13) Chamár; preparers of hides and workers in leather. The Chamár is a village official (see *post* p. 331); his wife, also, is the village midwife; 18,966. (14) Bárí; collectors of *sál* leaves and makers of leaf plates. They come from Oudh, and are properly torch-bearers; 92. (15) Mahalí; a labouring and basket-making caste, classed by different observers with Doms, Bhúmij, and Bediyás. Their origin is doubtful, but they are probably akin to the Bhuiyá tribe; number, 8999. (16) Rajwár; a mongrel tribe especially addicted to *dákáití* and highway robbery. "They live in the villages as a kind of serfs and bearers of burdens, carry palanquins, and sometimes till a little land for themselves." By Dr Buchanan-Hamilton and Sir George Campbell they are classed as aborigines. Another conjecture ranks them as Rájbhars; and they themselves claim kindred with Rájputs, Kurmís, and Musáhars. The Bengal members of the caste admit that they were the offspring of Kurmís and Kols. Hindus regard them as very impure, and will not take water from their hands. The Rajwárs of Sargújá and the neighbouring States are a far more respectable class than those of Lohárdagá. Number in Lohárdagá, 3359. (17) Musáhar; work for hire, and also search for and sell roots and drugs to shopkeepers; number in Lohárdagá, 54. For a more detailed notice of the caste, see the Statistical Account of Hazáribágh (*ante* p. 82). (18) Pásí; sometimes called Tirsuliyá, are perhaps connected with the bird-catching tribes of Arakh, Byádh, and Báheliyá. They were famous for their skill in archery, and are said to have been a great and powerful nation. Their own tradition is that they were originally Bhars, and used to intermarry with Rájputs. In the North-Western Provinces Pásís are much employed as watchmen, but in Behar they

are chiefly occupied as makers and sellers of palm-toddy. Number in Lohárdagá, 1103. (19) Khairá; labourers and cultivators; a tribe of obscure origin, not mentioned by Colonel Dalton. They are probably akin to the Kharwárs, and may perhaps have come from Khairágarh *parganá* in the District of Allahábád. Number, 8488.

(20) KHARWÁR; landlords and cultivators, 33,573; with the following divisions separately enumerated in the Census:—Bhogtá, 33,452; Ganjhu, 383; Mahat, 19; and Mánjhi, 98. In the paragraphs on the Cheros and Mundas (Nos. 6 and 11 of the section on Aboriginal Races) mention has been made of Colonel Dalton's theory, that the Gangetic provinces were once occupied by peoples speaking a Kolarian language closely allied to the present Munda dialect, among whom the Cheros were the latest dominant race. These pre-Aryan inhabitants of Behar possibly included the broken tribes of Nepál, the Koch of Kuch Behar, the Cheros, the Kharwárs, and the Kolarian aborigines who have preserved their own language. If, however, the Kharwárs, Cheros, and Kols originally formed one nation, the Kols must have parted from the parent stock and settled in Chutiá Nágpur before the two former tribes embraced Hinduism, and erected the various temples of which the ruins still recall their rule in Behar; for all of these are dedicated to the worship of idols, and it is a distinctive feature in the religion of the Kols of the present day that they never attempt to represent their deities, or to build any sort of habitation for them.

The following passages are quoted from Colonel Dalton's section on the Cheros and Kharwárs in the *Ethnology of Bengal*:—

ORIGIN.—"The Kharwár legends declare their original seat to have been Rohtás, so called from having been the abode of Rohitaswa, son of King Harischandra, of the family of the sun. Considering themselves to be entitled, as subjects of his paternal Government, to claim to be of the same family as their father and chief, they call themselves Súrjya-bansas, and wear the *paitá*, or caste string, as good Kshattriyas. Others say they are a mixed race, who originated during the reign of Rájá Ben, by whose order all men were allowed to mate themselves with women of any caste or country; and the Kharwárs are the offspring of a marriage between a Kshattriya male and Bharni female (*i.e.*, a woman of the aboriginal races). From the extreme ugliness of their physiognomy, I am inclined to believe that the mass of Kharwárs are of pure Turanian descent; and it is not improbable that they are allied to the Kiratis, who, we are

informed by Mr Hodgson, call themselves by a nearly similar name —viz., Kirawa—and have, like the Kharwárs, one clan or division of the tribe called Mánjhi. Speaking of the Kharwárs of Sháhábád, Dr Buchanan-Hamilton states that great confusion prevails concerning them, because in different places they have, in very different degrees, adopted the rules of Hindu purity in very different situations of life. Some are found amongst the labouring classes, bearing burdens and carrying palanquins; some have attained positions as landowners, lording it over Bráhmans and Rájput *rayats;* whilst others occupy the tableland, unmixed with any other tribe, and there is little reason to doubt that they are its original inhabitants. These, he observes, have retained the features by which the aboriginal tribes of the Vindhyan mountains are distinguished, but no one has met with any of the tribe who retain a trace of their original language. If the conjecture of affinity between Kiratis and Kharwárs be correct, the structure of the original language would connect them with the Munda or Kolarian races. Mr Hodgson has given a full account of the Kirant or Kirati language, and says that the complex pronominalisation of the Kiranti verb points to a special connection with the Munda. In the fragments of an ancient religion preserved by the Kharwárs, notwithstanding their Hinduism, there is much that supports the theory of their having been at one time in some way associated, if not connected, with the Kolarians.

Religion.—"The Kharwárs observe, like the Kols, triennial sacrifices. Every three years a buffalo and other animals are offered in the sacred grove, *Sarna*, or on a rock near the village. They also have, like some of the Kols, a priest for each village called *páhn* or *baigá*. He is always one of the impure tribes—a Bhuiyá or Kharwár, or a Parheyá; and he alone can offer this great sacrifice. No Bráhmanical priests are allowed on these occasions to interfere. The deity honoured is the tutelary god of the village, sometimes called Duár Pahár, sometimes Dharti, sometimes Purgahaili or Daknai; a female, or Dura, a sylvan god, the same perhaps as the Darhá of the Kols. The Kharwárs are divided into four tribes or families—Bhogtás, Mánjhis, Ráuts, and Mahátos. The Bhogtás are found in the hills of Palámau skirting Sargújá, in Tori and Bhanwar Pahár of Chutiá Nágpur, and other places. They have always had an indifferent reputation. The head of the clan in Palámau was a notorious freebooter, who, having been outlawed, and

having successfully evaded every attempt to capture him, finally obtained a *jágír* on his surrendering and promising to keep the peace. He kept to his engagement, and died in fair repute; but his two sons could not resist the opportunity afforded by the disturbances of 1857-58. After giving much trouble, they were captured,—one was hanged, the other transported for life; and the estate was confiscated. The low Kharwárs strongly resemble the Santáls in feature. They are very dark, with pyramidal shaped low noses, thick protuberant lips, and cheekbones or *zygomata* that project so as to make the temples hollow. In their worship of the *manes* of their ancestors and their triennial, or sometimes biennial, sacrifices to the tutelary pagan gods, they follow the custom of the Kolarian tribes; but here, so far as I know, the similarity ends. The Kharwárs are of a lazy, sullen disposition, and have no festive meetings like the Santáls and their brethren. In adopting Hinduism, it is the bloody Kálí, as Chánda, that they most delight to honour; and if they are not maligned, many a human victim suffers on the altars erected by them in her name. It is a fact that some of our people who fell into their hands in 1857 and 1858 were so dealt with. In a village recently visited by me in Palámau on the borders of Sargújá, I found all the inhabitants Kharwárs except one family,—that of the village pagan priest, who was a Korwá. I have often remarked this peculiarity of the borderers, to take as priest the greatest barbarian they could find in the neighbourhood. They argue that the hill people, being the oldest inhabitants, are best acquainted with the habits and peculiarities of the local spirits, and are in least peril from them. Besides, they are wholly pagan; whilst the people in whose behalf they make offerings having Hindu and Bráhmanical tendencies, could only offer a divided allegiance to the sylvan gods, which it might not be safe to tender. The chosen priest was called the *baigá*. He told me that he offered sacrifices in the name of the village every second year to Chindol, a male spirit, Chanda, a female spirit, and to Parvin. Buffalo, sheep, and goats are offered to all these promiscuously. They do not associate Chanda with Kálí, and make no prayers to any of the Hindu gods; but when they are in great affliction, they appeal to the sun. They have no particular name for the luminary, calling it *suraj*, and any open place on which he shines may be the altar. The other gods have shady retreats. These villagers honoured their ancestors by a yearly offering of a wether goat; this is strictly a family affair.

The animal is killed and eaten at home. The Kharwárs do not indulge in dancing as an amusement after the fashion of the Kolarian Uráons, but they have dancing festivals in which the women join. They dance apart from the male performers; and are so modest about it, that not only is each girl's head covered by her own dress, but a light cloth is thrown in addition over the heads of the whole group. The Korwás of this part of Palámau have adopted this mode of double veiling. It appeared strange to see Kolarian girls disporting themselves in so prudish a fashion, and I am satisfied that their cousins of Singbhúm, Mánbhúm, and Santália, would soon laugh them out of such *mauvaise honte*."

The following paragraphs are condensed from the notice of the Kharwárs of Palámau, given in Mr Forbes' Settlement Report:—

SUBDIVISIONS.—The Kharwárs recognise two main divisions, the Pátband and the Dewálband. The former term perhaps denotes that portion of the race which had its original home in the high tableland (*pát*) of Rohtás; while the latter indicates the dwellers in the plains. The Dewálband Kharwárs are the most numerous, and contain the three sub-classes of Mánjhi, Ráut, and Ganjhu. The Pátband division, however, hold a higher social position, and wear the *janáo* or sacred cord. The sub-classes of the Pátband are the Bhogtá, who are the soldiers of the tribe; the Tirwárs, who may perhaps have been the archers; and the Bissits. The two latter are chiefly found in Singrauli, and are not numerous in Palámau. A further distinction between Pátband and Dewálband Kharwárs is, that the latter permit to an elder brother's widow the custom of *sagai* or marriage, with a meagre and inexpensive ceremony; which the Pátband repudiate as a low-caste practice. Another name by which the Kharwárs are known is Athárahazár; which Mr Forbes considers a mere local appellation, and accounts for by the legend that when the Chero marauder, Bhagwant Rái, seized Palámau, he was assisted by an army composed of Cheros and Kharwárs, numbering respectively twelve thousand and eighteen thousand men. In the paragraph on the Cheros (*ante* pp. 262, 263) it has been observed that their name of Bárahazár is an allusion to the number of this original invading force, and it seems not improbable that the Kharwár title is due to a similar source. In general character the Kharwárs resemble the Cheros, but are fiercer and more martial. The Bhogtás, in particular, have always been a turbulent set, and were the first to rebel in the Mutiny of 1857. From the earliest

times the Kharwárs received many *jágírs*, or service tenures, from the Rájás of Palámau; but their natural extravagance and indolence have reduced most of them to the position of cultivators. The relations between the Kharwárs amd the Hindu traders or money-lenders are fully discussed below in the paragraph on the Condition of the Cultivators.

THEIR RELIGION, like that of the Cheros, has been powerfully affected by the influence of Hinduism. They use the Hindu forms of oath, and employ Bráhmans as their spiritual guides and domestic priests. In spite of this, many of the ancient forms of worship remain; and the belief in witchcraft and the power of evil spirits is as strong as among the less civilised aboriginal tribes. The Kharwárs appear to recognise vaguely the existence of a Supreme Being, whom they call by the Hindu name of Parameswar; but they stop short at the mere recognition, and do not worship him under any definite shape. Three or four times a year they worship two good deities—Darha, a male; and Dákin, a female—with offerings of country spirit and pigs. An evil spirit called Purbiá is also propitiated, but the precise nature of his malevolence, as well as the mode of worshipping him, is uncertain. The most prominent of the Kharwár divinities is Gánhel, the village god—a being of doubtful sex, who presides over the sowing and gathering in of the crop. Gánhel is worshipped at seed-time and harvest with offerings of sheep, kids, or goats, according to the means of the votary. Symbols of him, in the form of a rough stone daubed with vermilion, are found at the foot of different kinds of trees in almost every village throughout Palámau; and all castes, from Bráhmans to Bhuiyás, join in his worship. The household gods of the tribe are Pachián, Cherí, and Chattar. Each family chooses one of these to consult in all domestic matters, and in times of sickness, with oblations of cloth, *ghí*, fowls, or kids.

MARRIAGE OF THE RÁNÍ.—The most curious of the Kharwár religious ceremonies is the triennial "marriage of the Ráni," which Mr. Forbes describes as follows:—"The Kharwárs, like all the aboriginal tribes, are very superstitious, and people the jungles and hills with spirits and gnomes, to whom they offer sacrifices at certain times of the year. One of the most remarkable of these spirits is called the Durjágiá Deotá, who also rejoices in the name of Muchak Ráni. She is a Chamáin by caste, and her home or *nehár* is on a hill called Bohúraj, situated in the Government village of

Juruáhar; her priests are the *baigás* of Juruáhar and Ukámánd villages. All the Kharwárs regard her with great veneration, and offer up pigs and fowls to her several times during the year. Once a year, in the month of November, what is called the *kárúj* takes place in her honour; the ceremony is performed in the village *kálihán*, or threshing-floor, when *pákwán*, a kind of bread, and kids are offered up. Once in every three years the ceremony of marrying the Rání is performed with great pomp. Early in the morning of the bridal day the whole of the two villages I have mentioned, both men and women, assemble with drums and horns, form themselves into procession, and ascend the hill singing a wild song in honour of the bride and bridegroom. One of the party is constituted the priest, who is to perform the marriage ceremony. This man ascends the hill in front of the procession, shouting and dancing till he works himself into a frenzy. The procession halts at the mouth of a cave, which exists, or is supposed to exist, on the top of the hill. The priest then enters the cave and returns bringing with him the Rání, who is represented by a small oblong-shaped and smooth stone daubed over with vermilion. After going through certain antics, a piece of *tasar* silk cloth is placed on the Rání's head; and a new *dohar* or sheet is placed below her, the four corners being tied together in such a manner as to allow the Rání, who is now supposed to be seated in her bridal coach, to be slung on a bamboo and carried by two men, like a palanquin. The procession then descends the hill and halts beneath a banian-tree in Juruáhar till noon, when the marriage procession starts for the home of the bridegroom, who resides on the Kándí Hill in Ukámánd village. On their arrival there, offerings, consisting of milk sweetened with *gur* or molasses, two copper pice, and two *mátiá* or bell-metal bracelets, are presented to the bride; she is then taken out of her palanquin and put into the cave in which the bridegroom, who belongs to the Agoriá caste, resides. This cave is supposed to be of immense depth, for the stone goes rolling down striking the rocks as it falls, and the people all listen eagerly till the sound dies away, which they say it does not do for nearly half an hour. When all is silent, the people return rejoicing down the hill, and finish off the evening with a dance. The strangest part of the story is, that the people suppose that the caves on the two hills are connected, and that every third year the Rání returns to her *nehár* in the

Bohúraj hill. They implicitly believe that the stone yearly produced is the same. The village *baigás* could probably explain the mystery. In former times the marriage used to take place every year; but on one occasion, on the morning succeeding the marriage ceremony, the Ráni made her appearance in the *baigá's* house. The *baigá* himself was not present, but his wife, who was at home, was very indignant at this flightiness on the part of the Ráni. The idea of her going about the country the morning after her marriage so shocked the *baigáin's* sense of propriety, that she gave the Ráni a good setting down and called upon her to explain herself; and as she could give no satisfactory account of her conduct, she was punished by being married every three years, instead of yearly as before."

MARRIAGE.—There are two forms of marriage among the Kharwárs, at both of which Bráhmans officiate. In the one, which is called *dáli*, the ceremony is performed at the bride's house; and in the other, *karuí*, at the bridegroom's. The first step in either case is the betrothal, which is effected by the father or some friend of the bridegroom, who makes the necessary arrangements for a feast, and pays a uniform customary sum of Rs. 6 (12s.) to the father of the bride. The Kharwár ceremonies are almost the same as those in use among the Cheros, and both tribes are extremely lavish in their expenditure on such occasions. The *Sarhul* festival of the Mundas and Uráons is kept by the Kharwárs in April. The headman of the village entertains all comers, and dancing and singing go on for two whole days and nights. At dawn of the first day all the houses and courtyards are swept, and the *dárí*, a small well with a wooden lining, emptied and thoroughly cleaned. The village *baigá* or priest performs certain ceremonies at the well, and every one present touches the wooden framework with vermilion. The party then return singing to the village, and the feast begins. No water can be drawn from the well during the festival.

(21) GHÁSÍ; scavengers and musicians; 15,700. Colonel Dalton writes of them as follows:—"But far viler than the weavers are the extraordinary tribe called Ghásís, foul parasites of the Central Indian hill tribes, and submitting to be degraded even by them. If the Chandáls of the *Puráns*, though descended from the union of a Bráhmaní and a Súdra, are the 'lowest of the low,' the Ghásís are Chandáls; and the people who further south are called Pariahs, are no doubt of the same distinguished lineage. If, as I surmise, they

were Aryan helots, their offices in the household or in the community must have been of the lowest and most degrading kinds. It is to be observed that the institution of caste necessitated the formation of a class to whom such offices could be assigned; and when formed, stringent measures would be requisite to keep the servitors in their position. We might thence expect that they would avail themselves of every opportunity to escape, and no safer asylums could be found than the retreats of the forest tribes. Wherever there are Kols, there are Ghásís; and though evidently of a different origin, the two tribes have been so long associated that the Ghásís form a recognised class in the Kol tradition of creation, which appropriately assigns to them a thriftless career, and describes them as living on the leavings and charity of the more industrious members of society. There are not fewer than 50,000 Ghásís in the Kol countries. Their favourite employment is no doubt that of musicians; no ceremony can take place, or great man move without the accompaniment of their discordant instruments—drums, kettledrums, half drums, and huge horns—to proclaim the event in a manner most horrifying to civilised ears." (22) Hárí; the Bengal scavenger caste; 200. (23) Káorá; swinekeepers, a caste whose principal home is stated in the Census Report to be the Districts of Húglí and the Twenty-four Parganás; 1981. (24) Bediyá; a wandering, gipsy-like tribe numbering 3540, who live by thieving and jugglery. For a further notice of these people, see the Statistical Account of Hazáribágh (*ante* pp. 82, 83). (25) Mihtar; sweepers; 321 in number.

Religious Division of the People.—The population of Lohárdagá consists of Hindus, Muhammadans, Element and Fetish worshippers, Christians, and a small number of Jains, known as Saráks, properly Sráwaks, who can hardly be distinguished from Hindus.

The Hindus are the most numerous section of the community. The Census Report returns their number at 374,871 males and 367,081 females—total, 741,952, or 60 per cent. of the total population; the proportion of males being 50·5 per cent. The Deputy Commissioner reports that the Hindu community is composed chiefly of the higher and lower castes, and that the intermediate castes are not largely represented. The Hindus hold a higher social scale in the District than any other religious body; but they are not as a rule zealous for their religion, and make but few proselytes.

The Muhammadans, according to the Census of 1872, number

29,211 males and 29,000 females—total, 58,211, or 4·7 per cent. of the total population; the proportion of males to females being 50·2. Very few of the Musalmáns rank high socially, and the bulk of them consist either of weavers (Joláhás) or of the descendants of cloth-merchants and horsedealers, who were retained by the *zamíndárs* as fief-holders for quasi-feudal services. None of the reforming sects of Islám are known in the District; and Muhammadanism, like Hinduism, has ceased to recruit its ranks by making fresh converts.

Christians.—In 1872, the Census disclosed a Christian population of 6524 males and 6254 females—total, 12,781 in the whole District, being 1 per cent. of the total population. This included Europeans, Eurasians, &c., to the number of 94, leaving a balance of 12,687 for the native Christians. The Deputy Commissioner reports that about 9000 of this number are baptized converts, and the remaining 3000, though not baptized, are "inquirers," and call themselves Christians. Nearly all the Christians are Mundas or ns, and belong to the agricultural classes. Most of them are . In spite of their poverty, however, they are rising in public nation, and have a common cause with their unconverted tribes- in the question of the *bhuinhárí* or original clearer's right in land. Partly to this common interest, and partly to the inactivity of both Hindus and Muhammadans, is due the increasing influence of the Christian community. A detailed account of the spread of Christianity in Lohárdagá District is given subsequently in the paragraph on Missions.

Division of the People into Town and Country.—The population of Lohárdagá District is almost wholly rural, and the Civil Station itself is little more than a collection of villages. Nor are the rural communities sufficiently numerous to run into one another, as in the more populous parts of Bengal, and thus to form groups which can hardly be distinguished from regular towns. The entire population being thus influenced by purely rural ideas, the bulk of administrative work is concerned with the agricultural classes and agricultural questions.

The Census Report of 1872 thus classifies the villages and towns:—There are 4427 villages containing less than 200 inhabitants; 1675 from 200 to 500 inhabitants; 322 from 500 to 1000; 48 small towns with from 1000 to 2000; 6 towns with from 2000 to 3000; 6 from 3000 to 4000; 1 from 4000 to 5000; and 1 from 10,000 to 15,000—total number of towns and villages, 6486.

The Census returns for the town of Ránchí itself are as follow:—Hindus, males, 3733; females, 2708—total, 6441. Muhammadans, males, 1410; females, 1232—total, 2642. Christians, males, 470; females, 344—total, 814. Other denominations, males, 1247; females, 942—total, 2189. Total of males of all denominations, 6860; females, 5226—grand total, 12,086.

The municipality of the town and Civil Station, which is the only one in the District, collected in 1871 a gross revenue of £669, 10s.; the expenditure amounted to £627, 12s.; and the rate of municipal taxation was 8 *ánnás* 10 *pie*, or 1s. 1¼d. per head of the population. Besides the municipality, there were three *chaukídárí* unions in 1869–70 for the maintenance of the police required for the larger villages; namely, Lohárdagá, with 750 houses, annual income £104, 6s., and expenditure £90, 19s. 7d.; Garwá, containing 863 houses, annual income £104, 4s 7d., and expenditure £92, 8s.; and Dorandá, with 378 houses, annual income £51, 18s., and expenditure £41, 3s. 2d.

The following is a list of the chief towns, places of interest, fairs in the District:—

RÁNCHÍ, the Civil Station of Lohárdagá, and the administrative head-quarters of the Chutiá Nágpur Division, is pleasantly situated on the high central plateau of the District, in 23° 22′ N. latitude, and 85° 23′ E. longitude, with a general elevation of about 2100 feet above sea-level. As in Hazáribágh town, the soil is clay mixed with gravel and sand, and is well suited for the growth of European vegetables, flowers, and fruit. Ránchí is little more than a cluster of villages with intervening cultivation, which have sprung up around the Civil Station since 1840, when the head-quarters of the District was transferred from Lohárdagá. From one of the smallest of these villages the Station takes its name of Ránchí. The place is the seat of no notable manufacture or commerce, but has a considerable money-lending business carried on by bankers from Márwár; and is also the distributing centre, for Lohárdagá and the Tributary States, of large quantities of cloth imported from Calcutta. The town has a Commissioner's office, Collector's office, courthouses, a jail, a good schoolhouse, and a small library maintained by public subscriptions. There are two churches, one belonging to the Anglican and the other to the German Lutheran Mission. The Charity Hospital, not a good building for the purpose, is maintained from local funds. Popu-

lation according to the regular Census of 1872:—Hindus, males, 3733; females, 2708—total, 6441. Muhammadans, males, 1410; females, 1232—total, 2642. Christians, males, 470; females, 344—total, 814. Other denominations not separately classified, males, 1247; females, 942—total, 2189. Total of all denominations, males, 6860; females, 5226—grand total, 12,086. It will be observed that the male Hindu population exceeds the female, while the Musalmán population of both sexes is almost equally balanced. This difference is probably due to the fact that the Hindu population contains a larger proportion of respectable men in official employ, who leave their families behind in their homes. In 1871, the gross municipal income amounted to £669, 10s., and the gross municipal expenditure to £627, 12s.; average rate of taxation, 8 *ánnás* 10 *pies*, or 1s. 1¼d. per head of the population.

Dorandá, the military cantonment, lies to the south of the Civil Station, from which it is separated by a small stream. It has a parade-ground and a rifle-range, with a small *bázár*, which is mainly supplied by the followers of the regiment. The military force stationed in the cantonment in 1874 was the 33d Regiment of Madras Native Infantry. The provisions of Act XX. of 1856 are in force in Dorandá. In 1870 the revenue amounted to £51, 18s., and the expenditure to £41, 2s.

Chutiá, a small village two miles to the east of Ránchí, contains an ancient temple standing in a small square enclosure, with four flanking bastions, and a well in the centre, which is approached by a gradually descending covered passage. This was the original residence of the Nágbansí family of the Rájás of Chutiá Nágpur. The name Chhotá (*sic*) Nágpur is a modern corruption of Chutiá. Rennell's map has "Chuttiah;" and in 1787, Mr J. Grant (*Fifth Report*, vol. i. p. 503) speaks of the Rájá's estate, as "Chutea Nagpoor." *Chutiá* in the local dialect of Hindí means 'a mouse.' In the enclosure near Ránchí there is an old temple containing three images of Ráma and his wife Sítá, which are under the care of a resident Bráhman.

Daltonganj, the administrative head-quarters of the Palámau Subdivision since 1863, is prettily situated on the eastern bank of the North Koel River, opposite to the old town of Sháhpur, where the picturesque ruins of the Maháráját's palace are still standing. It contains a courthouse, a lock-up, a handsome schoolhouse, a charitable dispensary, and several bungalows; and is the seat of a con-

tinually increasing trade with Mírzápur, Sargújá, Hazáribágh, and several Districts of Behar.

GARWÁ, on the North Koel River some distance to the north-west of Daltonganj, is the chief trading centre of the Palámau Subdivision. The provisions of Act XX. of 1856 are in force. In 1870 the municipal income amounted to £104, 4s., and the expenditure to £92, 8s.

LOHÁRDAGÁ, forty-five miles to the west of Ránchí, was up to 1840 the administrative head-quarters of the District to which it gives its name. It has an important market, and is assessed for purposes of watch and ward under Act XX. of 1856. In 1870, the municipal income was £104, 6s., while the expenditure amounted to £90, 19s.

JAGANNÁTHPUR, a small village three miles south-west of Ránchí, contains the largest temple in the District. It stands on a high rock, commanding an extensive view of the plateau around Ránchí, and is built on a plan roughly resembling that of the great temple of Jagannáth at Purí. At the *rath játrá* or car festival, which takes place in July, the temple is visited by about six thousand pilgrims.

DOISÁ, in the Fiscal Division of that name, about thirty miles south-west of Ránchí, is the site of a ruined palace, once inhabited by the Rájás of Chutiá Nágpur. "The house," says Major Depree, "is five-storied and of brick; the temples and buildings around are of elegantly carved granite. An inscription cut on one of the stones shows the place to have been built in 1721 Samvat, or A.D. 1664. It is snugly ensconced between rocky hills, and is now deserted and enveloped in briars and thorns. The legend goes that after Rájá Raghunáth Sáhi built the *garh* or fort, he lived there for a few years only, and left it at the bidding of a Bráhman, who declared the place unlucky. The Rájá afterwards lived at Pálkot, selecting that spot on account of a perennial stream which issues from the rocky hillside; there he built himself a holy cell, so that he could drink and perform his devotions with the aid of the water, pure and uncontaminated by his subjects, who lived in the town below. The buildings here are extensive, but devoid of all architectural interest. The Rájá has within the last few years [1868] changed his residence to Chaunro, having discovered that Pálkot was ill-omened, as his ancestor found Doisá to have been."

At TILMÍ, a small village in the Fiscal Division of Sónpur, there

is a ruined fortress, once the seat of the Thákurs, a subordinate branch of the Chutiá Nágpur family. At the mouth of a stone well within the *enceinte* of the fort, a Sanskrit inscription, written in the modern Devanágarí character, was discovered by Bábu Rákhál Dás Háldár, Special Commissioner under the Chutiá Nágpur Tenures Act of 1869. The inscription relates to the dedication of this well in 1794 Samvat, or A.D. 1737, by one of the Thákurs named Akbar, "for the attainment of the four *vargas* or beatitudes." In explanation of the apparent anomaly of a Hindu with the Muhammadan name of Akbar, Bábu Rákhál Dás Háldár refers to the well-known Munda practice of adopting foreign names; and suggests that this Akbar of Tilmí may have been of Munda descent. Akbar, however, is one of the few Muhammadan names which Hindus have adopted, and the compounds of it with Sinh occur in histories.

Two other inscriptions, dated respectively Samvat 1722 (A.D. 1665) and Samvat 1739 (A.D. 1682), and written in Hindí, were found by the same officer at a village called Boreá, about five miles north-east of Ránchí. They record the commencement and completion of a stone temple, still standing in the village, as the monument of its founder's devotion to Madanamohana. The Bábu says, "We learn that Rs. 14,001, in the currency of that period, were expended in constructing the shrine. The sum was very large, considering the fact that the chief building material, stone, was close at hand. Now, allowing a high remuneration for the architect, there was still a considerable balance left, which probably remunerated the labourers. If *begári* or forced labour, so urgently demanded by the present landlords, had been in vogue, a much smaller amount would have sufficed for building the shrine in question." Transcriptions and translations of these inscriptions are given in a paper by Bábu Rákhál Dás Háldár in the *Asiatic Society's Journal* for 1871, from which the foregoing remarks have been condensed. It deserves notice that the letters of all three inscriptions are cut in relief.

FAIRS.—Two large annual fairs are held in Lohárdagá District:—One at Chutiá, about two miles to the south-east of Ránchí; the other at Daltonganj, the administrative head-quarters of Palámau. Both are held in the month of February. The Ránchí or Chutiá fair was first established in 1851 by Mr Crawford, Agent to the Governor-General for the South-West Frontier, at Sillí, about 38 miles from Ránchí, on the main road to Puruliá. In 1855, Mr Ricketts, in his

Report on Chutiá Nágpur, speaks of the poverty of the chiefs living round Silli, and the want of shelter for persons attending the fair, and recommends its removal to Chutiá, where there is a mango grove covering over a hundred acres of land, three large tanks, the river Subarnarekhá close at hand, a village in which goods might be secured, and the *bázár* at Ránchí less than two miles off for visitors to lodge in. This proposal was carried out, and the fair has since been held at Chutiá. The original object of the fair was to establish an attractive centre for the general encouragement of trade and exhibition of local produce; to improve the social relations between the different chiefs, who were disposed to isolate themselves; and to bring them into friendly communication with the European officers of the Province. For some years these objects were to a certain extent attained, and the annual fair is still regarded as a great social gathering; but as a meeting for the purposes of trade, it has of late years declined. The native gentry cannot afford to buy horses and elephants every year; and as the Ránchí shops supply the finer descriptions of clothing and other goods required by them, they are not obliged to defer their purchases to a particular time of the year. In 1872, the value of the articles exposed for sale in the fair books was estimated at £15,077, 18s., and of articles sold, £2580, 18s.; of animals brought for sale, £17,600; sold, £281. The athletic sports, games, &c., attracted a large concourse of people.

The fair at Daltonganj in Palámau was established in February 1873. The number of people that assembled was estimated at from 20,000 to 25,000. The sales of cloth, which is the chief import of Palámau, aggregated in value between £3000 and £4000. The Assistant-Commissioner anticipated that, if the fair was successful in future years, it would give a real impetus to the trade of Palámau, by bringing in foreign traders and buyers, and breaking up the monopoly of the local merchants.

Village Officials.—The following account of the village officials in Chutiá Nágpur Proper is condensed from a Report in 1839 by the Principal Assistant to the Governor-General's Agent; from papers regarding the Indigenous Agency employed on the Census of 1872; and from a special Report on the Land Tenures of Chutiá Nágpur Proper by Mr G. K. Webster, C.S.

According to ancient and universal tradition, the central table-land of Chutiá Nágpur Proper was originally divided into *parhás* or rural communes, comprising from ten to twenty-five villages, and

presided over by a divisional chief, called the *rájá* or *múnda* of the *parhá*. In 1839, titular *rájás* of the *parhá* were still existing in the Fiscal Division of Khukrá near Ránchí, who retained considerable authority in tribal disputes, and at times of festival and hunting. But this element in the Kol village system has now fallen into decay, and survives only in the *jhandás* or flags of the *parhá* villages, and in the peculiar titles bestowed on the cultivators themselves. The exclusive right to fly a particular flag at the great dancing festivals is jealously guarded by every Kol village, and serious fights not unfrequently result from the violation of this privilege. Besides this, individual villages in a *parhá* bear specific titles, such as *rájá*, *diwán*, *kunwár*, *thákur*, *chhotá lál*, &c., similar to those which prevail in the household of the reigning family, which obviously refer to some organisation which no longer exists. I am informed by Mr T. F. Peppè that these officials still make the arrangements for the large hunting parties which take place at certain seasons of the year.

A Kol village community consists, when perfect, of the following officers:—*Múnda*, *máhato*, *páhn*, *bhandárí*, *goráit*, *goálá*, and *lohár*. Washermen, barbers, and potters have been added since 1839, and even now are only found near much frequented halting-places, and in villages where the larger Hindu tenure-holders live. The Kols invariably shave themselves, and their women wash the clothes.

(1) MÚNDA.—The *múnda* is the chief of the *bhuinhárs*, or descendants of the original clearers of the village. He is a person of great consequence in the village; and all demands from the *bhuinhárs*, whether of money or labour, must be notified by the owner of the village through the *múnda*. He is remunerated for his trouble by the *bhuinhárí* land, which he holds at a low rate of rent, and receives no other salary. In the Fiscal Division of Lodhmá, and in the south-eastern portion of the District, he sometimes performs the *máhato's* duties as well as his own, and he then gets a small *jágír* of half a *páwá* of land rent-free.

(2) MÁHATO.—The functions of a *máhato* have been compared to those of a *patwárí* or village accountant, but he may be more aptly described as a rural settlement officer. He allots the land of the village among the cultivators, giving to each man a *goíí* or clod of earth as a symbol of possession; he collects the rent, pays it to the owner, and settles any disputes as to the amount due from the *rayats*; and in short, manages all pecuniary matters connected with the land.

He is appointed by the owner of the village, and receives one *páwá* of *rájhas* land rent-free, as a *jágír* or service-tenure. But the office is neither hereditary nor permanent, and the *máhato* is liable to be dismissed at the landlord's discretion. Dismissal, however, is unusual, and the *máhato* is often succeeded by his son. Where the *máhato* collects the rents, he almost universally receives a fee, called *báttá*, of half an *ánná* from each cultivator, or of one *ánná* for every house in the village. In one village, *báttá* amounts to four *ánnás* and a half on every *páwá* of land. Occasionally, where there is no *bhandárí* or agent for the owner's rent-paying land, the *máhato* gets three bundles (*karais*) of grain in the straw, containing from ten to twenty *sers* apiece, at every harvest. Thus, during the year he would receive three bundles of *gondli* from the cold-weather crop, and the same amount from the *gorá* or early rice, and the *don* or late rice. In *khálsá* villages, which are under the direct management of the Mahárájá, the *máhato* often holds, in addition to his official *jágír*, a single *páwá* of land called *kharcha* or *rozina kket*, from the proceeds of which he is expected to defray the occasional expenses incurred in calling upon cultivators to pay their rent, &c.

The functions of the *máhato* are shown in greater detail in the following extract from Dr Davidson's Report of 1839:—"On a day appointed, the *thikáddr* or farmer proceeds to the *akhṛá* or place of assembly of the village, where he is met by the *máhato*, *páhn*, *bhandárí*, and as many of the *rayats* as choose to attend. He proceeds, agreeably to the dictation of the *máhato*, to write down the account of the cultivation of the different *rayats*, stating the number of *páwás* held and the rent paid by each. Having furnished this account, any new *rayats* who may wish to have lands in the village, after having the quantity and rent settled, have a *goti* given to them. If any of the old *rayats* require any new land, a *goti* is taken for that, but not for the old cultivation. The *máhato* collects the rent as the instalments become due, according to the above-mentioned account given to the farmer; and all differences as to the amount of rent payable by a *rayat*, if any ever arise, which very seldom happens, are settled by the opinion of the *máhato*. So well does this mode answer in practice, that in point of fact a dispute as to the amount of rent owed by a *rayat*, is of rare occurrence. When a farmer wishes to cheat a *rayat*, he accuses him of having cultivated more land than he is entitled to, or of owing him *maswár* or grain-rent for land held in excess; and if such a thing as a dispute as to the

amount of rent owed ever does arise, the *máhato's* evidence is generally considered conclusive by both parties."

(3) PÁHN.—The importance of the *páhn*, or priest of the village gods, may be inferred from the current phrase in which his duties are contrasted with those of the *máhato*. The *páhn*, it is said, "makes the village" (*gáon banátá*), while the *máhato* only "manages it" (*gáon chaláta*). He must be a *bhuinhár*, as no one but a descendant of the earliest settlers in the village could know how to propitiate the local gods. He is always chosen from one family; but the actual *páhn* is changed at intervals of from three to five years by the ceremony of the *súp* or winnowing-fan, which is used as a divining-rod, and taken from house to house by the boys of the village. The *bhuinhár* at whose house the *súp* stops is elected *páhn*. On the death of a *páhn*, he is frequently but not invariably succeeded by his son. Rent-free lands are attached to the office of *páhn* under the following names:—(1) *Páhní*, the personal *jágír* or service-tenure of the priest, generally containing one *páwá* of land. (2) *Dálikatári*, for which the *páhn* has to make offerings to Jáhir Búrhí, the goddess of the village. It is called *dálikatári*, as it is supposed to defray the expenses of the *Karm* festival, when a branch (*dálí*) of the *karma* tree is cut down and planted in the fields. (3) *Desauli*, a sort of *bhutkheta* or devil's acre, the produce of which is devoted to a great triennial festival in honour of Desauli, the divinity of the grove. This land is either cultivated by the *páhn* himself, or by *rayats* who pay him rent. (4) *Pánbhárá* and *táhálu* are probably the same. Lands held under these names are cultivated by the *páhn* himself or his near relations; and whoever has them, is bound to supply water at the various festivals.

(4) BHANDÁRÍ.—The *bhandárí* or bailiff is the landlord's agent in respect of the management of the village. He is usually a Hindu, and represents the landlord's point of view in village questions, just as the *páhn* is the spokesman of the *bhuinhárs* or original settlers. He generally holds one *páwá* of land rent free from the owner, receiving also from every *rayat* three *karais* or sheaves of each crop as it is cut—one of *gondli*, one of early rice, and one of wet rice. Instead of the land, he sometimes gets Rs. 3 or Rs. 4 in cash, with 12 *káts* or 4½ cwt. of paddy.

(5) GORÁIT.—The *goráit* is, in fact, the *chaukidár* or village watchman. He communicates the owner's orders to the *rayats*, brings them to the *máhato* to pay their rents, and selects coolies when

required for public purposes. As a rule, he holds no service-land, but receives the three usual *karais* or sheaves from every cultivator.

(6) ÁHIR or GOÁLÁ.—The *áhir's* duty is to look after the cattle of the village, and to account for any that are stolen. He is remunerated by a payment of one *kát* of paddy for each pair of plough-bullocks owned by the cultivators whose cattle are under his charge. He also gets the three *karais* or sheaves at harvest-time, besides an occasional *súp* or winnowing-fan full of paddy. If cows are under the *áhir's* charge, the milk of every alternate day is his perquisite. In the month of *Aghan* (December) he takes five *sers* of milk round to the cultivators, receiving in return *pakhirá* or 20 *sers* of paddy as a free gift. He always pays the *ábwáb* known as *dádani ghi*, and in some villages has to give the *baitháwán ghi* as well. In a very few cases the *áhir* holds half a *páwá* of land rent-free.

(7) LOHÁR.—The *lohár* or blacksmith gets one *kát* of paddy and the three *karais* for every plough in the village, and is also paid two or three *ánnás* for every new *phár* or ploughshare. In a very few villages he holds half a *páwá* of land rent-free.

The *koiwál* or constable and the *chaukidár* or watchman do not belong to the genuine Munda-Uráon village system, and need not be mentioned here.

In the Fiscal Division of Torí the bulk of the inhabitants belong to the Kharwár sub-tribe of Bhogtás, and the village system differs from that which prevails on the central plateau. Here the *páhn* is the only official who holds service land, and he gets half a *pattí*, or not quite two standard *bighás*. He performs the village *pujás*, and often does the work of a *máhato*, when the owner of the village is an absentee. But even then the landlord sometimes employs a bailiff, called *baráhil*, to collect the rents.

In the tract known as the Five Parganás, including the Fiscal Divisions of Támár, Bundu, Sillí, Ráhe, and Barandá, as well as in the *Mánkipattí*, or that part of Sónpur *parganá* which borders on Singbhúm District, we meet with *mánkis* and *múndas* who are undoubtedly the descendants of the original chiefs, and still hold the villages which their ancestors founded. Here the *parhá* divisions exist in their entirety, as groups of from twelve to twenty-four villages, each of which has its own *múnda* or village head; while the whole commune is subject to a divisional head-man called *máñki*, who collects the fixed rents payable by the *múndas*. The chief

village officer is the *páhn*, who holds from one to five *káts* of land rent free as *dálikatári*. A *kát* in this sense is a measure of land analogous to, if not identical with, the *khandí* of the Kolhán in Singbhúm, and denotes the quantity of land which can be sown with one *kát* of seed. In this part of the country the *múnda* sometimes has a deputy called *díwán* who assists him to collect his rents, and *bhandáris* are occasionally met with.

VILLAGE OFFICIALS IN PALÁMAU.—The following paragraphs are condensed from Mr Forbes's Settlement Report on Palámau, and from a special Report by the same officer on the Land Tenures of the Subdivision. In most villages in Palámau we find five regular village servants—the *baigá*, *kotwár* or *goráit*, *chamár*, *barhí*, and *lohár*.

(1) BAIGÁ.—The chief duties of the village priest, variously called *baigá*, *pujárí*, or *páhn*, consist in keeping away evil spirits from the village, and in performing sacrifices to propitiate them. No village is without a *baigá*; and such is the superstition of the people, that they would rather desert their land than remain on it without a priest. "Generally speaking," says Mr Forbes, "he is a member of one of the aboriginal tribes, but in some cases I have found Bráhmans and Rájputs holding the office. He is looked up to with awe by every caste in the village, is responsible for the appearance of disease among man and beast, and is bound to offer up the necessary sacrifices to drive it away. He is supposed to be better informed on all that concerns the village than any one else, to have a thorough knowledge of its boundaries, and to be able to point out each man's tenure. Among the jungle tribes, he is invariably the arbiter in all disputes as to land or rent, and is the oracle in all discussions affecting the ancient customs and rights of the village, with all of which he is supposed to be intimately acquainted. He is bound at the commencement of each harvest to offer up sacrifices, and to perform certain ceremonies to propitiate the spirits. For this purpose he levies contributions of money, grain, cloth, fowls, and goats from all the villages. Until these sacrifices have been performed, no one would think of yoking a plough, and the *baigá* often takes advantage of delay to increase his demands.

"The office is hereditary, but in the event of its becoming necessary to appoint a *baigá*, a meeting of the entire village community is held, and the successor is chosen by vote; the individual selected is then called upon to accept the post, and in the event of his doing

so, a day is fixed for the ceremony of installation. On the appointed day the whole village community meet in solemn conclave. The landholder or village head-man presides; and the proceeding commences by his calling upon the candidate to state publicly whether he is willing to accept the *baigáship*, and on giving a reply in the affirmative, the emoluments he will receive and the duties he will have to perform are explained to him. He is then conducted round the boundaries of the village, the different landmarks of which are pointed out to him. The whole party then return to the place of meeting, when the president taking up the *baigá's* wands of office, which are called *churi kátári*, solemnly hands them to the new incumbent, and the installation is complete. The wands above referred to are the sacrificial instruments, and are heirlooms of the village; they are presented in the formal manner above described to each successive *baigá*, and are used solely in sacrifices."

In every village there are lands specially set apart for the support of the *baigá*, which he holds rent-free. When his jurisdiction extends to two or more villages, he holds land only in the village where he actually resides, while the others pay him tithes in kind. The average extent of *baigá* holdings is about two standard *bighás* of rice-land, with a certain area of upland attached. But Mr Forbes mentions one such tenure, in which the rice-growing area alone amounted to sixteen standard *bighás*. If there are any *mahuá* or mango-trees in the village, the *baigá* gets a share of from two to five trees. Towards the south, some of the *baigás* on the Government farms claimed to hold from two to three hundred *mahuá* trees; but they were unable to prove possession, and their claims were consequently disallowed.

(2) KOTWÁL or GORÁIT.—The *kotwál* is properly the village messenger, but he has come to be treated as a sort of general drudge. He is usually a Dosádh; but many other castes, such as Bhuiyás, Uráons, Kharwárs, Parheyás, Dóms, and others, often occupy the post. He is supposed to be appointed by the owner of the village, and to be his servant, his duties being to carry to the police station information of crime, or of any occurrence requiring the interference of the police. A *kotwál's* jurisdiction generally extends over from two to six villages; and where there is no *chaukidár*, he performs the duties of village watchman. In many villages he holds a small tenure rent-free, and gets from Rs. 3 to Rs. 6 annually, besides a sheaf of unthreshed grain from every cultivator's crop. This perquisite

is called *pánjá*, and frequently forms the entire remuneration of the *kotwál*. In any case, however, he receives at the winter harvest a *paserí* or two of grain, as a free gift from the cultivators. This annual present varies in amount according to the richness of the crop, and is called *khalihání*, from *khalihán*, a threshing-floor. The office of *kotwál* is generally hereditary, but when it does become vacant, the landholder has the power of appointing a successor. He is bound, however, to send information to the police, giving the name of the new incumbent. The *chaukídár* is remunerated in the same way as the *kotwál* or *goráit*, but his profits are larger. He is a Government servant, and under the immediate control of the police. At the time of the Settlement, provision was made for him in cases where he was under-paid, the arrangements for his stipend being otherwise left undisturbed. By far the greater number of both *chaukídárs* and *goráits* were found receiving *pánjá* only, and this mode of payment is appreciated by them, as being sure and profitable. As a rule, they do not care to hold lands, because their duties often carry them out at critical times; and the very small income derived from the rent of the land, should they lease it out, is not sufficient for their support.

(3) CHAMÁR.—The *chamár* is bound to supply the ploughs with the hide-thongs attached to the yokes. He is paid only at the winter harvest, when he gets a *paserí* or two (about ten *sers*) of grain, according to the generosity of the *rayat*. He is also entitled to the skins of dead cattle, out of which he makes a considerable profit. *Chamárs* are often suspected of causing disease among the cattle for the sake of their skins.

(5) BARHAÍ.—The *barhaí* is the village carpenter, and his duty is to keep the ploughs in repair. For this he gets a perquisite called *manni*—that is, he is entitled at the winter harvest to one *maund* of grain, half of which must be paddy; and at the spring harvest to another *maund* of whatever grain the cultivator chooses to give him.

(5) LOHÁR.—The *lohár* is the village blacksmith, and has to keep the ploughshares in order, for which he is paid on the same scale as the carpenter. The public duties of both *barhaí* and *lohár* are confined simply to keeping the village ploughs in repair; they are separately remunerated for any other work they may happen to do for individuals.

Besides the foregoing there are two other village officers found in the Palámau Subdivision—the *patwárí* and the *baráhil*. The former

is confined to a few estates bordering on Gayá District. As in Behar, he is the accountant of the village, and is remunerated by tithes levied from the cultivators. The *baráhil* or land-agent is found in almost all private estates. He represents the proprietor, and is the immediate link between him and the tenantry. He makes settlements, measures and assesses land, looks after the landlord's own cultivation, and performs generally all the duties of a manager. Sometimes he receives a fixed stipend, but more generally he is remunerated by tithes. In some villages these duties are performed by an officer called *jeth rayat*.

Village Disputes: Ordeal.—The methods of determining village disputes in Lohárdagá District derive their peculiar character from the universal belief that not only every village, but almost every plot of land, is peopled by malevolent spirits, who, unless suitably appeased, are continually on the watch to frustrate all human arrangements. Hence it is that the village priests (*páhns* or *baigás*) and the diviners (*sokhas* or *ojhás*) are more frequently resorted to for the decision of rural questions than *panchávats* or village committees. With the advance of civilisation and the growing influence of the Christian population, these superstitions are beginning to fade away; and in the villages around Ránchí the authority of the *páhn* has of late years visibly declined. But even now, questions of fact as to boundaries and the ownership or possession of land can sometimes be decided with almost absolute certainty by the oath of the *páhn*, sworn on the land. The procedure is this:—The *páhn*, standing on the contested land, takes up a clod of earth, and placing it on his head, swears to speak the truth, imprecating awful calamities on himself, his children and his crops, in the event of his telling a lie. At the present day, perhaps, the truth is more often to be inferred from the priest's reluctance to take this oath, and his preference for the ordinary procedure of the courts; but there is no doubt that, twenty years ago, the entire boundary of a village could thus be ascertained with absolute certainty.

In the event of a genuine doubt, where two *páhns* are at issue on a question of fact, a more curious mode of decision, called *gorgárí*, is resorted to. The following description of *gorgárí* is quoted from a paper of 1795 in the *Asiatic Researches* "On some Extraordinary Facts, Customs, and Practices of the Hindus," by Sir John Shore, then President of the Asiatic Society:—"From habitual neglect in ascertaining the quantities of land held in a lease, and in defining

with accuracy their respective tenures, frequent disputes arise between the inhabitants of different villages regarding their boundaries. To determine them, a reference is usually made to one or more of the oldest inhabitants of the adjacent villages; and if these should not agree in their decision, other men are selected from the inhabitants of the villages claiming the disputed ground, and the trial proceeds as follows. Holes are dug in the contested spot, and into these holes each of the chosen men puts a leg, and the earth is then thrown in upon it; and in this situation they remain, until one either expresses a wish to be relieved, or complains of being bitten or stung by some insect. This decides the contest; and the property of the ground is adjudged to belong to that village, the inhabitant of which goes through the trial with the most fortitude and escapes unhurt by insects." A substantially similar account of the practice is given by Professor Wilson in his *Glossary of Indian Terms*, where he says that the subjects of the ordeal are the watchmen of the contending villages, who are buried up to the waist. At the present day the *páhns* are the actors in the transaction, and one leg is buried up to the knee, so that the men can sit down.

Another portion of Sir John Shore's paper gives the history of a case in 1792, in which five women were put to death with the consent of their own relations on a charge of witchcraft. Three modes of detecting a witch were then practised in Rámgarh District, viz.:— "*First*, Branches of the *sál* tree, marked with the names of all the females in the village, whether married or unmarried, who have attained the age of twelve years, are planted in the water in the morning for the space of four hours and a half; and the withering of any of these branches is proof of witchcraft against the person whose name is attached to it. *Secondly*, Small portions of rice enveloped in cloths marked as above are placed in a nest of white ants; the consumption of the rice in any of the bags establishes sorcery against the woman whose name it bears. *Thirdly*, Lamps are lighted at night; water is placed in cups made of leaves, and mustard-seed and oil is poured drop by drop into the water, whilst the name of each woman in the village is pronounced; the appearance of the shadow of any woman on the water during this ceremony proves her a witch." A ceremony closely resembling the third of these methods is performed by the *ojhás* in Palámau at the present day. It is called *kánsá kurthí*, and consists in throwing a handful of coarse pulse (*kurthí*) into a shallow bell-metal (*kánsá*)

dish, the shadow of the grains being interpreted by the *ojhá* so as to disclose the witch. Indeed, the matter rests entirely in the hands of the *ojhá*, who thus commands a powerful weapon to employ against his personal enemies, or the unfortunate barren woman whom he usually denounces, if he has no special enmity to gratify. Throughout the Chutiá Nágpur Division, the most terrible form of this superstition is the belief that certain men, like the were-wolves of mediæval Europe, can assume at will the forms of tigers. Once this belief has gained credence with regard to a particular person, corroborative evidence, such as the disappearance of cattle and the like, is not wanting, and he is certain to be murdered.

THE MATERIAL CONDITION OF THE PEOPLE: CLOTHING.—The ordinary dress of a well-to-do shopkeeper generally consists of a cotton *dhutí*, or waistcloth wrapped round the loins and falling over the legs as far as the knee; a *chádar*, or cotton sheet or shawl, which serves as a covering for the upper part of his body; and a pair of country-made shoes. To this is sometimes added a *jámá*, or sort of short coat, and a *topi*, or cotton cap covering the head for a man. For a woman, a cotton *sárí*, or piece of cloth five yards long, so adjusted as to cover the whole body; and a *kurtá*, or jacket with half sleeves which fits tight to the shape, and covers, but does not conceal, the bust. An ordinary husbandman wears only a *kaupín*, or a long strip of cloth worn as a girdle round the loins, knotted behind, and the ends brought between the legs and fastened to the girdle in front. Occasionally he has a small *chádar*, which is converted into a head-dress and worn as a turban when at work in the fields. A coarse *sárí* forms the entire dress of a female.

DWELLINGS.—The building materials for the dwelling either of a shopkeeper or a *rayat* generally consist simply of earth and posts, with a thatched roof. The houses are single huts with two or three compartments. A shopkeeper adds perhaps a detached hut for a kitchen. These remarks do not apply to the houses at Ránchí, where they are in a somewhat better style.

THE FURNITURE usually met with in such a house consists of a few sets of brass or pewter utensils for cooking, or for eating and drinking from; some earthen pots, also for cooking; one or two [illegible] water-jars; a *machiá* or rude chair; one or two mats of date-[illegible], and a *chárpái* or two, for sleeping purposes. The furniture [illegible] it may be called, of an ordinary peasant, consists [illegible] one or two brass or earthen pots; a *tumbá*, or dried

hollow gourd used for drinking-water; a *chárpái* and a mat for sleeping on.

Food.—The shopkeeper lives on rice, flour, pulses (*dál*), clarified butter (*ghí*), curries made of vegetables, sweetmeats, preserved fruits, &c. The food of an ordinary peasant consists of rice, *maruá*, *gondli*, *makai*, pulses (*dál*), oil, vegetables, &c. The *maruá* and *gondli* are not used during every month of the year, nor is *makai* procurable everywhere in the District; when these fail, their place is supplied either by rice or certain jungle fruits and roots. *Ili* or *bodai*, rice-beer, is a necessary drink with the majority of *rayats*.

The Deputy-Commissioner estimates the living expenses for the family of a well-to-do shopkeeper, consisting of three adults and two children, to amount to Rs. 6, or 12s. per month, and of a cultivator to Rs. 4, or 8s. per month. The figures above quoted represent what would be the cost of living, provided that everything had to be purchased in the *bázár*. It should be remembered, however, that a husbandman produces himself the greater portion of what is required for his support.

Agriculture: Soils.—Throughout Chutiá Nágpur Proper, the soil consists of a red ferruginous loam, which contains a very small proportion of lime. Although not so rich as the soil of Hazáribágh, it is deeper and more friable, and is well suited for growing *gorá* or highland rice, *surgujiá*, and tea. For spring crops such as wheat, barley, grain, &c., it requires high cultivation and frequent manure.

The physical conformation of Palámau is far less uniform than that of Chutiá Nágpur Proper. The cultivators in this part of the District distinguish five varieties of soil as follows:—(1) *Kewál*, the black friable soil of the wide river valleys, chiefly consisting of decomposed gneiss and hydraulic lime. It is highly retentive of moisture, and will stand a long succession of crops without requiring to lie fallow. (2) *Goriá*, or white *kewál*, contains a large proportion of nodular lime (*kankar*). It is best adapted for spring crops, such as wheat, barley, *sarsun*, &c.; but when it occurs in large patches which can readily be irrigated, it serves also to grow rice. (3) *Doma kewál*, a rich black clay, fertile for rice where irrigable, but not so productive under a spring crop as the foregoing. (4) *Akraut*, a poor soil, consisting of sand and gravel mixed with clay, which is often fit for hardy crops, such as *til*, *kulthí*, and cotton. (5) *Lálmatti*, the "red earth" of the southern portion of Palámau, is the characteristic

soil of Chutiá Nágpur Proper. (6) *Réhrá*, a soil containing a large proportion of salt. It will hardly bear any crop, but is much valued in a village, as it forms good salt-licks for cattle.

Classes of Land.—The system of agriculture followed in Lohárdagá District is determined, particularly in the case of rice, by the physical conformation of the country. This is composed of long undulating ridges, between which the drainage runs off to join the large streams. The lower slopes of these ridges, and the swampy ground between, supply the only land on which a wet rice crop can be raised. The soil is, in the first instance, brought under cultivation by cutting level terraces out of the hillside, a small bank to hold water being left round the edge of each plot. The hillsides thus present the appearance of a series of steps, varying from one to five feet in height; and when the slopes are too steep for terracing, or the soil too stony for cultivation, the bed of the stream is banked up and made into one long narrow rice-field. The rice terraces are flooded as soon as possible after the rains set in, and the water is retained until the crop ripens in late autumn. After the crop has been reaped, the higher levels become dry and hard; but the lower fields remain so muddy until February and March, that they can only be crossed on foot along the edges of the terraces.

In Chutiá Nágpur Proper, the rice-fields (*kiyárí* or *dhan-khet*) thus constructed are divided into the three following classes, having regard to the height of the land and its capacity for remaining moist until the season for transplantation:—(1) *Garhá*, the rich alluvial land which lies lowest in the trough or depression between the ridges, and which from its position receives all the vegetable mould washed off the slopes. The best *garhá* land remains moist and capable of yielding crops throughout the year, while the inferior sorts get dry towards the end of the hot weather. (2) *Sokrá* or *gariá* lies higher up the slope than *garhá*, and remains dry during a longer period. (3) *Chaurá*, again, is situated considerably above the foregoing, and is the highest land on which rice can be grown at a profit without artificial irrigation. The tops of the ridges, and the higher slopes which lie above the *chaurá* lands, are classed as *tánr*, and sown with wheat, barley, pulses, and miscellaneous crops. It should be observed, however, that *tánr* lands are divided from rice-lands by a continually shifting line, and that in crowded villages the margin of rice cultivation is being gradually carried, by fresh terracing, higher [illegible] slopes. In Chutiá Nágpur Proper there is no standard of

land measurement—that is, the local unit (*khárí* or *kat*) does not denote a definite superficial area. Indeed, the *khárí*, which is the unit of assessment for rice-land, varies so enormously both in its size and the rent it bears, that an average, based on whatever number of recorded measurements, would be useless for any practical purpose. The obscure question of the land measure in Chutiá Nágpur Proper is treated of at length in the paragraph on Weights and Measures (*post* pp. 359-361).

In the Subdivision of Palámau, the rice-lands (*kiyárí* or *dohar*) are divided, on a system similar to the foregoing, into three classes:—(1) *Aj* or *jáh*, the best low-lying rice-lands, which remain moist throughout the year. The rent paid varies from R. 1 to Rs. 4 per standard *bighá*, or 6s. to £1, 4s. per acre. (2) *Chaunr* lies somewhat higher up the slope than the foregoing, and gets dry earlier in the year. Its capacity for a second crop depends upon the soil. Thus black clay (*kewál*) will grow a crop of *khesárí dál* as well as rice; while *bálsundar*, or *kewál* mixed with sand, gives a heavier return of rice, but is not fit for *khesárí*. The rent paid for *chaunr* land varies from 12 *ánnás* to Rs. 2-12-0 per *bighá*, or from 4s. 6d. to 16s. 6d. per acre. (3) *Chánchar*, rice-lands of the higher levels, which are either entirely dependent on the rainfall for moisture, or can be irrigated by the *áhrás* or high-level reservoirs, which are constructed at the upper ends of the drainage hollows. The rent varies from 4 *ánnás* to R. 1 per *bighá*, or from 1s. 6d. to 6s. per acre.

The uplands which grow cereals other than rice, and also pulses, and miscellaneous crops, are known as *bhitá*, and are thus classified:—(1) *Dihkam*, land immediately surrounding the village, which grows wheat, *mahuá*, mustard, sugar-cane, and other valuable crops. These lands are cultivated with great care, being fenced in and manured, and in many villages irrigated from *kachchá* wells. Rent from 4 *ánnás* to R. 1 per *bighá*, or from 1s. 6d. to 6s. per acre. (2) *Báharsi*, lands forming the outer ring of uplands round the village, which is cultivated for the most part with *rabí* or cold-weather crops. Rent from 2 to 8 *ánnás* per *bighá*, or from 9d. to 3s. per acre. (3) *Bárí*, garden lands [illegible] round a *bárí* or homestead. These are held rent-[illegible] resident cultivators; but, if assessed, would pay from 2 to [illegible] *ánnás* a *bighá*, or from 9d. to 1s. 6d. an acre. (4) *Dhúb* land lies at the shallow end of the basin of an *áhrá* or reservoir, and is highly prized for the rich crops of wheat which it yields. Being necessarily of small extent, it is usually held by the village head-man. (5) *Tánr* is

outlying jungle land, that has only recently been reclaimed. It is rarely cultivated for more than two successive seasons, and is then allowed to relapse into jungle, and again cleared. Rent is paid at from 1 to 3 *ánnás* per *bighá*, or from 4½d to 1s. 1½d. per acre.

Rice Cultivation.—Rice forms the principal product of Chutiá Nágpur Proper; while in Palámau, rice cultivation is confined to the more highly-tilled parts of the Koel and Amánat valleys. The Deputy-Commissioner reports that the rice crops of the District are divided into three classes—viz., *tewán* or lowland rice, comprising both an early and an autumn crop; *gorá* or upland rice; and *don*, which includes two autumn crops, and the great winter rice crop of the year.

The *tewán* or lowland rice is sown in moist ground or in the beds of streams, and consists of two varieties. The first of these is an early crop, sown in January and reaped in May. The second or *kanáo* crop is sown in June and reaped in September. Neither of these are transplanted, and the rice which they yield is coarse.

The *gorá* or upland rice is also grown on *tánr* land, that is, on the crests of the undulating ridges which make up the face of the country. It is sown after the first fall of rain in June and reaped in September, and is never transplanted. The following varieties of rice are included in the *gorá* crop:—(1) *Koreá*; (2) *dáni*; (3) *karangá*; (4) *arsangá*; (5) *bundiá*; (6) *kirambá*; (7) *baká*; (8) *kháting*; and (9) *sikri*. All these sorts are coarse rice.

The *don* class of rice includes three crops. One of these is sown broadcast on moist land in June and reaped in the autumn. The coarser varieties of rice-plant are usually sown in this crop. Another crop is sown on moist land and reaped at the same time as the foregoing; it is usually transplanted, and consists of finer varieties of rice, such as *bánkirás*, *ráichuni*, *newári*, and *tilásár*. The third and most important crop of the *don* class is sown on high land at the beginning of the rains, transplanted to low-lying wet land in July, and reaped in the months of November and December. This crop includes many varieties of rice-plant, of which the following are the chief:—Coarse—(1) *Ratgoli*; (2) *jhingá* [illegible] *dhání*; (4) *barí mugdhi*; (5) *kshír dánt*; (6) *nongá*; (7) [illegible] *usli hur*; (9) *háti pánjar*; (10) *bhainsá chándi*; (11) *jhátai* (12) *mahádeo jat*; (13) *lál mugdhi*; (14) *sárguí*; (15) *gangá-* [illegible] (17) *hará khunta*; (18) *jhabrí*; and (19) *bak pánjar*. —(1) *Sítá bhog*; (2) *síkí sundarí*; (3) [illegible] *im sál*; (4)

rán siki; (5) *gol bhantá*; (6) *charki rás*; (7) *ghiuhar*; (8) *rání kájal*; (9) *kanak chur*; (10) *bhantá phul*; (11) *dumar phul*; (12) *kesar phul*. Fine—(1) *Prasád bhog*; (2) *sital chini*; (3) *rái munfi*; (4) *kapur sál*; (5) *son khariká*; (6) *dahuki jirá*; (7) *runiá pánk*; (8) *kapur dhul*; (9) *megh jawáin*; (10) *ládu jawáin*; (11) *sám jirá*; (12) *bás mati*; (13) *siri kamal*; and (14) *báns phul*.

As a supplement to the foregoing crops, and by way of insurance against loss in any or all of them, a special variety of rice called *karhani* is sown on any sort of land in July, when the other rice is transplanted. Thus, should the nursery-grown plant fall short from any cause, the land prepared to receive it can be sown with *karhani* rice.

The foregoing account of rice cultivation in Chutiá Nágpur Proper is based upon the agricultural returns specially furnished in 1871 by the Deputy-Commissioner. A more general and more correct classification is into the four following crops:—(1) *Gorá*, or highland rice, sown broadcast on high land either immediately before or immediately after the *chhotá barsát*, or first rainfall of May and June, and reaped in August. (2) *Lahuhan*, or autumn rice, sown broadcast, or sometimes transplanted, in June, and reaped in October. This crop is grown on the middle and higher levels of the terraced fields which lose their moisture early in the year, and therefore require a rice which comes to maturity quickly. (3) *Jarhan*, or winter rice, sown in a nursery on high lands in June, transplanted to low land in July, and reaped in November and December. (4) *Boré*, or spring rice, follows the *jarhan* crop on lands which are overflowed by *dáris* or natural springs, or in any way command a supply of water all the year round. After the *jarhan* harvest in November and December, the ground is ploughed over once and *boré* rice sown broadcast, to be harvested in the following April and May. Thus, both in the land which it requires and in the seasons for sowing and reaping, the *boré* rice of Lohárdagá corresponds precisely to the *boro dhán* of Lower Bengal. Like the latter, also, it yields a coarse grain. *Karhani* rice has been noticed in some detail above, and may perhaps be regarded as a distinct crop.

Rice of the highest quality is not grown to any extent in Lohárdagá. It is supposed that improved varieties of rice are gradually coming into use, but owing to the large size of the District no accurate information is available on this point. The soil, however, is so well suited for the finest varieties of rice, that *zamindárs* who culti-

vate both here and in Behar import rice from Chutiá Nágpur for their own consumption, in preference to that of Behar. Similarly, there is no doubt that rice cultivation is being gradually extended; but no estimate can be given of the area that has been brought under tillage of late years.

THE NAMES OF THE RICE-PLANT in the different stages of its growth are as follows:—*Bíhan*, the seed; *birá*, *múrí*, and *gáchhí*, the young plant; *dhán*, the full-grown plant, and also unhusked rice; *chául*, husked rice, *bhát*, boiled rice.

THE DIFFERENT PREPARATIONS MADE FROM RICE are the following:—*Chira*, paddy first steeped in water, afterwards parched, then husked and flattened in a rice-pedal. *Murí*, paddy steeped in water and boiled, afterwards dried, husked, and parched. *Lawá*, paddy parched and husked. *Pithá* or cake, and *roti* or bread, are solid preparations made from rice. *Hándiá* or rice-beer is made by boiling rice in a little water so as to burn the layers at the bottom. It is mixed with *ránu*, a compound of various roots found in the jungles, and is fermented for three or four days before being strained off for use. It is sold at half an *ánná* per *ser*.

OTHER CEREAL CROPS.—The other cereal crops grown in Lohárdagá District are as follow:—*Goham* or wheat, Múnd. *nil* (Triticum vulgare), is sown on high land in September and reaped in March. *Dhúb* land lying at the shallow end of the basin of an *áhrá* or reservoir is largely planted with wheat. The crop is irrigated three times during the year. *Jau*, barley, Múnd. *nil* (Hordeum hexastichom), is sown on high land in September and October, and reaped in March and April. *Jawár* or *musurí*, great millet, Múnd. *gángai* (Sorghum vulgare), sown in March and April, and cut in September. *Bájrá*, or spiked millet, Múnd. *suti* (Penicillaria spicata); *kángni* or Italian millet, Múnd. *irbá* (Pennisetum Italicum); *Chiná* (Panicum miliaceum); and *kodo*, Múnd. *nil* (Paspalum scrobiculatum); all sown on *tánr* land in June and reaped in October and November. *Gondli* (Panicum miliare), sown on the sa[illegible] of land, and cut at the same season as the above. *Maruá*, M[illegible] Eleusine coracana), sown in June, transplanted in July, a[illegible] ugust and September. *Margi* or *makai*, Indian C[illegible] Zea mays), sown in May and June and reaped in [illegible]mber. Two varieties are grown, the red and white. [illegible] staple food of the lower classes for six months [illegible]*án*, Múnd. *iri* (Panicum frumentaceum), sown in

June and cut in August. *Kherí* and *bherí* are sorts of millets, Múnd. *nil*.

PULSES AND GREEN CROPS, locally known as *dálihan*.—*Musurí*, (Ervum lens), sown in September or October and reaped in March. *Mug* (Phaseolus mungo), sown in June and July and reaped in September. *Urid*, or green gram, Múnd. *rámbará* (Phaseolus Roxburghii), sown in June and July and reaped in September. *Kulthí*, Múnd. *horé* (Dolichos uniflorus), sown on *tánr* land in September and reaped in November and December. *Chaná* or *bút*, gram (Cicer arietinum), sown in September and October and cut in March. *Arhar* or *rahar*, Múnd. *rahará* (Cajanus Indicus), sown in July and reaped in November. *Khesári* (Lathyrus sativus), sown on moist land in September and October and reaped in March. *Matar* (Pisum sativum), sown in September and cut in March.

OIL-SEEDS.—The oil-seed crops grown in Lohárdagá District comprise the following:—*Rai* or *sarsun*, mustard, Múnd. *máni* (Sinapis dichotoma), sown in October and reaped in February. *Lotni* and *toti* are said to be oil-seeds, but I cannot find out either their scientific names or the seasons of their cultivation. *Til*, Múnd. *tilmí* (Sesamum orientale), sown on high land in September or October and reaped in March, forms one of the staples of Palámau, and is largely grown throughout the southern portion of the Subdivision. It is a hardy crop, grows on poor light soils, and does not require elaborate cultivation. The average yield of *til* is 4 *maunds* or 3 cwts. per acre, and it sells at R. 1-12 a *maund*, or 4s. 9d. a cwt. *Surgujiá* or *rámtil* (Guizotia oleifera), sown in July and August on *tánr* land, and reaped in November and December. *Tisí*, or linseed (Linum usitatissimum), sown in September or October and reaped in March. *Karanj*, Múnd. *nil* (Pongamia glabra), sown and reaped with *tisí*. *Rerí*, castor-oil plant (Ricinus communis), sown in September and October and reaped in February and March.

MISCELLANEOUS CROPS.—*Ketárí* or *akh* (Saccharum officinarum), planted from cuttings in February or March on the best homestead lands, and cut in November or December of the following year. *Aphín* or *postá*, opium (Papaver somniferum), sown in September and October on the best homestead land, and cut in February and March. The crop is manured, irrigated, and carefully weeded. *Pán* (Chavica betel) is sown on moist land in May, and the leaves are gathered in the following March. It is transplanted, and requires to be well irri-

gated. *Haldí*, turmeric (Curcuma longa), is planted on garden lands in June and July and cut in March. The land is thoroughly turned up to the depth of a foot, and plentifully supplied with old manure and ashes. The average out-turn is 15 *maunds* per *bighá*, valued at from Rs. 150 to Rs. 200, or 1 ton 13 cwts. per acre, worth from £45 to £60.

COTTON.—*Kapás*, sown in July and cut in November, forms, with *til*, the staple crop of the Palámau Subdivision. Two methods of growing cotton are practised in Palámau—*kachwán* and *dáhá*. For *kachwán*, a plot of land is usually selected which was under *til* or some similar crop in the preceding season. It is ploughed three or four times, and the seed is sown broadcast after the next fall of rain. *Rahar dál* is sometimes sown with the cotton. *Kachwán* is not a popular mode of growing cotton, on account of the expense incurred in weeding the crop. This expense is almost entirely avoided by the second method of cotton cultivation called *dáhá*, which is followed by the aboriginal and semi-aboriginal races. A piece of forest land is chosen, the trees are cut down, and the whole field covered with a thick layer of brushwood, which is set on fire during the hot weather. The alkali of the wood-ashes forms an excellent manure. After the first showers of rain the field is lightly ploughed over once, and the seed sown broadcast. The only expense incurred between sowing and harvest is for fencing the field to keep off deer. Mr Forbes estimates the produce of an acre of cotton at 3 *maunds* 15 *sers*, or nearly $2\frac{3}{8}$ cwts., value Rs. 20, or £2; and the cost of cultivation at Rs. 11-1-6, or £1, 2s. 2d. The net profit, therefore, is about Rs. 8-14-6, or 17s. 10d. per acre. Cotton suits the soil of Palámau, and is a favourite crop with all the wilder races of the Subdivision. But for the hampering effect of the custom of borrowing [illegible] on the security of the incoming crop, the area under cotton [illegible] could, in Mr Forbes's opinion, be increased at least four- [illegible] months of April, May, and June, when food is scarce, [illegible] to the *mahájans* and petty traders for small loans, [illegible] o live and to buy seed for the coming autumn har- [illegible] them mortgage only their cotton, and some the [illegible] oming crops. But once a cultivator has resorted to [illegible] ant, he is rarely able to shake himself free again; [illegible] wondered at, when we consider the rates of interest [illegible] loans are taken. For instance, a cultivator borrows, [illegible] rupee on his cotton crop; for this he binds himself

to deliver to the grain merchant, when his crop is ripe, one (*kachchá*) *maund* or 48 lbs. of seed-cotton, the market price of which at the cheapest rate, 12 (*kachchá*) *sers* per rupee, is Rs. 4." The acreage under cotton crops in 1870 was estimated by Mr Forbes at 9600 acres, distributed over 1600 villages; the average cotton area in each village being six acres. Total yield:—38,400 (*kachchá*) *maunds*, or 948 tons 17 cwts. of raw cotton, value Rs. 153,600, or £15,360; of which 28,000 (*kachchá*) *maunds*, or 691 tons 17 cwts., worth Rs. 112,000, or £11,200, are exported to Benáres and Mírzápur, while 10,400 (*kachchá*) *maunds* or 257 tons are worked up into cloth by the Joláhás or Musalmán weavers of the Subdivision.

Tobacco cultivation is confined to Chutiá Nágpur Proper, and is not practised in Palámau, except on a very trifling area of garden-land in the town of Garwá. The following paragraphs describing the mode of growing the plant adopted in Chutiá Nágpur Proper are slightly condensed from an elaboráte report on the subject by Mr T. F. Peppè, Sub-Deputy Opium Agent at Ránchí. The cultivation of the tobacco-plant is almost entirely confined to the tract known as the Five Parganás, which lies below the central plateau at an elevation of 700 to 800 feet above the sea, and differs entirely in soil and climate from the plateau of Chutiá Nágpur Proper. The climate resembles that of Behar, or more nearly perhaps that of Bánkurá and Midnapur. The heat in May is very great, and the hot winds prevail for upwards of a month; while in December the temperature falls very low, especially in the early morning. As to the soil, the chief peculiarity is the alluvial deposits along the banks of the rivers, which form some 10 per cent. of the whole area cultivated. This may seem a large proportion, but it should be borne in mind that the country lies between the hills forming the plateau of Chutiá Nágpur and the Subarnarekhá River; and that the entire drainage of the plateau and of the Five Parganás has to cross this fertile tract of country on its way to the Subarnarekhá.

The area of tobacco-growing land in this part of the District is estimated by Mr Peppè at from 500 to 600 *bighás*, or from 166 to 200 acres. This, in fact, represents almost the entire area under tobacco in Lohárdagá; for in all other parts of the District, except in this eastern tract, the plant is only grown in small patches for local consumption. Owing to the indefiniteness of the local land measures, the cost of cultivation per acre, as well as the out-turn of crop, is particularly difficult to estimate. Looking, however, to the

fact that irrigation is extensively applied to the tobacco crop, the cost of cultivation probably ranges from Rs. 15 to Rs. 20 per *bighá*, or from £4, 10s. to £6 per acre. The maximum out-turn under favourable circumstances is stated by Mr Peppè to be, at the first cutting, 10 *maunds* of dried leaf per *bighá*, or 22 cwts. per acre; and at the second cutting, 3 *maunds* per *bighá*, or 6½ cwts. per acre. The price of the leaf ranges from Rs. 4 to Rs. 6-4-0 per *maund*, or from 10s. 11d. to 17s. 1d. per cwt.

As a rule, all the cultivation is confined to alluvial lands; it is only in exceptional circumstances that there is any cultivation elsewhere. It is commonly grown in small patches in the gardens round the houses for home consumption, and every one makes and smokes his home-made cheroots rolled up in a *sál* leaf.

There are two kinds of tobacco cultivated, viz., *bará* or *maghiá-tamáku* and *hinguliá* or *khágariá*, also sometimes called *Velátí-tamáku*. There are two methods of cultivating both these kinds, which may be termed the wet or dry methods. The *maghiá* tobacco is the kind most commonly cultivated in this District. The leaf is a large lanceolate one, whereas the *hinguliá* kind has small leaves partly curled, and only half the size of the other. It is said that the smaller kind is much more pungent in flavour, but it gives much less produce than the large kind. It is evidently a late introduction, and is reported to have been introduced by the Koerís from Hazáribágh some sixty or seventy years ago. I have never seen it in any other District except Mánbhúm, where it is more largely cultivated than in Lohárdagá.

The first method of cultivating is as follows:—A seed-bed is prepared in a well ploughed and manured piece of garden-land in September, and sown broadcast. It is watered, if necessary, until the plants are four inches high; and in November-December they are transplanted into holes dug 1½ feet apart, and the young plants are protected from the sun with a covering of straw or leaves of the castor-oil plant. Before transplanting, the land is ploughed about twenty times, and well manured and levelled into beds to allow of subsequent irrigation. The principal manures are cow-dung, ashes, and sugar-cane refuse; the little holes dug for the young plants are filled up with a mixture of soil and well-rotted manure. It is watered very sparingly by the hand for the first week after transplanting, and then hoed two or three times, according as the land is free from weeds or not. By the time it is

nine inches high, the soil is formed into ridges round the plants; and when about a foot high the top is nipped off to make it more bushy, a slight incision being made in the stem for the same purpose. At the end of March or beginning of April the plant is cut down, leaving about two inches of the stem in the ground; this is watered and hoed as before, when a second crop is obtained, which is cut down in the same manner about the end of April or middle of May. It is calculated that if the first crop gives 10 *maunds* of dry leaf per *bighá*, the second will give 3 *maunds*: the first crop fetches upwards of Rs. 6 per *maund* of dry leaf, and the produce of the second crop only Rs. 4 per *maund* of dry leaf. The first crop is used as dry leaf for chewing, and the second for smoking purposes, as the produce of the second crop is thought to be inferior.

The second method is this:—A seed-bed is well ploughed and manured in garden-land in August, and the seed sown broadcast in it. No water is given; and when ready for transplanting in September, it is transplanted into garden-land, well ploughed and manured in much the same way as with the other method. It is watered a little, if necessary, but this is rarely required; it is also shaded from the sun in the same way. No water is given at any time after the plants have struck; but it is hoed several times and kept perfectly free of weeds. The soil is also heaped up round the stem as the plants get older, and by December it is cut down in the usual manner. But it is common to leave a longer portion of the stem in the ground; and in many places the custom is to strip the leaves singly without cutting the stem at all, and the plants in this way yield a continual supply of leaves until the approach of the hot weather, when it can no longer subsist without water. It is then allowed to dry up and wither, or the plants are allowed to seed for the next season's sowing. The first crop is calculated to give 6 *maunds* of dry leaf, and the second about 2 *maunds*, at an average cost of about Rs. 8 per *bighá*, or Rs. 24 per acre; but it is very difficult to obtain anything like an accurate estimate, and the above is but a rough approximation. Both kinds of tobacco may be grown in this way, but it is more usual to apply it to the cultivation of the *hinguliá* kind.

The method of curing adopted is much the same for both kinds, and is irrespective of the method of cultivation. When the plant is cut down, it is collected in the field, stems and all, and

spread out to dry; next morning it is turned over and left to wither, and the third day it is again turned. The fourth day it is collected into small bundles, containing five or six plants in each, and carried to the courtyard of a house, where it is placed on straw and piled up for about a foot or a foot and a half high, large stones being placed on the top. If it is very dry, it is first sprinkled with water, and for the next five days the same process is repeated; it is then ready for disposal, and is sent away, stalks and all.

There are no data available to show the quantity exported, but the only demand seems to be from the District of Singbhúm. All traders come from that side, and there is no export to the west or north. On the contrary, Tirhut tobacco finds its way to every *bázár* in the District; and even in Tamár, where most of the local plant is cultivated, Tirhut tobacco is found to be an article of import. It is said that hookah tobacco can only be made from Tirhut leaf. For some time past the cultivation of the poppy has been gradually supplanting tobacco in the tract of country under notice, and the latter will probably soon cease to be grown except for home consumption. This is due partly to the increase of tobacco cultivation in Singbhúm, and the consequent fall in the demand from that District; but chiefly to the fact that the poppy is in itself a more profitable crop, and is off the fields before the dry weather of May, when tobacco still requires laborious irrigation.

Silk.—In Chutiá Nágpur Proper the production of *tasar* silk is confined to the police circle of Tamár and a small part of Torpá, and is nowhere pursued on a large scale. It is, however, an industry of some importance in the Palámau Subdivision. The following paragraphs are condensed from a report on the subject by Mr Forbes:—

In this part of India, wild, that is, free jungle-bred cocoons are the exception, and domesticated the rule. There are two harvests or breeding seasons in the year; the first of which begins in June and ends in August; while the second begins in September and ends in November. The cocoons set aside in November for seed are carefully packed in *kodo* straw, and stowed away in some dry place till the following July. In the months of June and July the cocoons are unpacked, strung upon thread and hung up to the roof of the breeding-house. From this time the labour of the breeders commences. After the cocoons have been threaded, they have to be carefully guarded from rats and little house-squirrels. The moth eats its way out within six to eight days after threading, and always during

the night. The following evening pairing takes place on the cocoons, as they hang. The next morning the females are taken off their respective cocoons, their wings tied with a piece of cotton, and they are deposited on little bamboo trays to lay their eggs. It has not been ascertained whether males pair twice or not. When incubation is over, the wings of the female are broken off and crushed between the forefinger and thumb over the eggs, so as to allow the soft down to fall upon them. If there is a westerly breeze blowing, the eggs are exposed to it; if not, a westerly wind is produced by a small hand-punkah being worked over them from the west. This performance is probably a mere superstition. When the eggs have been properly dried, they are put into a small cradle, made of a leaf rolled up into a hollow cone and fastened against the wall. In about eight or nine days the young worms begin to appear, and the leaf is then taken down and carried to the *ásan* plantation, where it is pegged to one of the trees; the leaves immediately above being bent down and pinned over it, so as to protect the young worms, and at the same time afford them the means of travelling up the branch. In two or three days the young worms leave the cradle, crawl up the branch, and spread themselves over the tree. Branches of this tree, with the young worms feeding on the leaves, are then cut off and fastened to other trees, and so on from tree to tree. All that is now required is to protect the feeding worms from birds, ants, a flying insect called *pachuí*, and other pests. The worm goes on alternately feeding and lying dormant during the time of skin-changing, until spinning commences. The first or September harvest is for breeding only; consequently a very limited quantity of cocoons are reared. These cocoons, when ready, are picked from the trees, packed in nets, and slung to the roof. Twelve days later they are taken down, the wood extracted, and the cocoons threaded as described above, and the process of hatching and rearing goes on the same way.

In Palámau the domesticated worm is fed only upon the *ásan* tree. Wild cocoons are never collected in the jungles, as they occur too sparsely to repay the trouble of gathering. The *ásan* tree, found growing in so-called plantations, is of indigenous growth, and is never planted or grown from seed, although it is believed that the rearing of young trees from seed would not be a difficult matter. It is a quick-growing tree, and can be utilised for feeding purposes in the third year; but after ten, or at most fifteen years, the leaves appear

to lose some necessary ingredient, as the worms will not then feed on them. The trees of most plantations vary from three to nine inches in diameter. The tree is never worked two successive years; and after the November harvest, it is pruned and allowed to regain its strength for a whole year. For this reason only half a plantation is worked at one time. In their wild state the worms will feed upon the following trees:—*Deotá*, *sídá*, *kokoré*, *baer* (Zizyphus jujuba), *khóriá*, *sál* (Shorea robusta), *ténd*, and a few others. The quality of the cocoon depends not only upon the species of tree, but upon the soil on which the tree grows. Thus an *ásan* plantation on black *kewál* or loam produces large, hard, and heavy cocoons of a black colour; white *kewál* produces cocoons of a dirty-white colour, inferior in size and weight to the foregoing; while wild cocoons found upon *koá* trees are much smaller, softer, and of a yellow colour.

Cocoons are counted and sold by the *khárí*, which contains from 1100 to 1200 cocoons—more generally the former; the higher number being taken in boundary villages, where, to prevent competition, rents are lower. Formerly, the right to the whole of the *koá* or silk revenue of Palámau was in the hands of Government, and was farmed out; but within the last few years, one small and three large estates have claimed and obtained the right to this revenue. When the whole was in the hands of Government, the proceeds of the *koá* amounted to Rs. 1500; it is now Rs. 1125. The production of cocoons is subject to the following taxes:—*Khutkar*, *pátkar*, and *hansuá*. *Khutkar* is the rent demanded by the proprietor or farmer of the land for the use of the trees; *pátkar* is the revenue paid by the farmer of the *koá* to Government, or to the proprietors of the exempted estates; *hansuá*, or sickle, is the tax levied by the farmers of the *koá* on the produce. This tax derives its name from the *hansuá* or sickle used in pruning the trees and gathering the cocoons, and forms in fact a royalty of Rs. 5 paid by every man who works on a plantation where cocoons are grown. Mr Forbes estimates the number of *hansuás* in the Subdivision at 2000, each *hansuá* representing a yearly out-turn of 5500 cocoons. Taking the number of cocoons that go to the *maund* at 3440, as computed by Mr Deveria of Ráníganj, the annual yield of cocoons in the entire Subdivision of Palámau would amount to 3190 *maunds*.

The rearing of *tasar* cocoons is not confined to any particular class. For the most part the following castes are occupied in th

work:—Chero, Kharwár, Uráon, Bhuiyá, Chamár, Dosádh, Málá, and Ghásis, but no Musalmáns. Their mode of working may be thus described:—Very few cocoons are kept for being used for propagation at the November harvest, and these only by well-to-do producers, who can afford to breed during the September harvest for the great harvest of November. In September, therefore, the poorer producers apply to the *mahájans* for advances, as *baijhán* for the purchase of seed-cocoons, and as *kaihán* for the means of supporting them during the breeding season. These advances are generally given at *derhá*, or 50 per cent., *i.e.*, for every rupee given R. 1-8-0 is returned. When the cocoons are ready, the *baniá* or *mahájan* appears on the ground and collects his dues, and the remainder is sold by the producer either to the *mahájan* or in the *háts*, at prices varying from Rs. 5 to Rs. 7 per *khári* of 1100 cocoons. Most of the *tasar* cocoons are exported to Benáres, Mírzápur, and Patná. There are a few *patuás* (Gosáins) in the Subdivision who reel off some cocoons for making the *zerbands* and *dandás*, worn by most of the respectable castes, either as waistbands or for fastening ornaments to; but no cloth of any kind is made.

DYES AND TANNING.—The following list of dyes and substances used for tanning in Chutiá Nágpur was drawn up for the Economic Museum by Mr T. F. Peppè, Sub-Deputy Opium Agent, Ránchí:—(1) *Lodh chhál* (Symplocos racemosa), bark boiled with *saji*, an impure carbonate of soda, dyes red. (2) *Amlá* (Phyllanthus emblica), *mahuá* (Bassia latifolia), *sál* (Shorea robusta), *gular* (Ficus glomerata), *ám* (Mangifera Indica), *bar* (Ficus religiosa), *jámun* (Syzygium jambolana), and *kachnár* (Bauhinia variegata); barks boiled up together dye a deep black. (3) *Sál chhál* (Shorea robusta); bark dyes red and black. (4) *Amlá* (Phyllanthus emblica); bark, leaves, and fruit dye purple and black; price, two *ánnás* per *ser* (1½d. a lb.). (5) *Harú* (Terminalia chebula); unripe fruit, used with *prot* or sulphate of iron, dyes brownish-black. The ripe fruit prepared in a similar manner gives purple-brown and black. (6) *Amaltás* (Cassia fistula); bark boiled with alum gives a bright red, which may be deepened by adding pomegranate bark; price, nominal. (7) *Bahedá* (Terminalia belerica); fruit boiled with *saji* dyes brown and snuff colour; used with iron, yields black and ashy-grey; price, 6 *pies* per *ser* (⅜d. a lb.). (8) *Chaili* (Morinda exserta); bark of root prepared with castor-oil seed, husks of *sarguji*á, and *lodh* leaves, gives a very durable bright red, used for the fringes of the *kariás* worn by

the Kols. (9) *Kamalá gundi* (Rottlera tinctoria); hairs from fruit boiled with *taj, jatámánsi*, and *katchur*, dye orange; price, 8 *ánnás* per *ser* (6d. a lb.). (10) *Rangphul* (Bixa orellana); seeds pounded and boiled with wood-ashes yield a pale yellow, resembling the colour of a China rose. (11) *Haldi* (Curcuma longa); roots treated with sour-milk and alum, dye a pure yellow, which takes a darker tinge if lime-juice or some similar acid be added. The shade of green known as *dhání* is obtained by mixing a little indigo with the above infusion. Price 3 to 4 *sers* per rupee (3d. or 4d. a lb.). (12) *Harsinhár* (Nyctanthes arbor-tristis); calyx of flower boiled up with the seed dyes yellow. A cloth thus dyed can be coloured red by soaking in a solution of betel-nut and water. (13) *Gendá* (Tagetes patula); petals of the flowers dried and boiled with alum, yield a dull green. (14) *Champá* (Michelia champaca); flowers boiled in water, dye yellow. (15) *Kúsúm* (Carthamus tinctorius); flowers pounded and mixed with wood-ashes, give a rose-red called *suithi*. (16) *Tun* (Cedrela toona); flowers treated in the same way as (12), dye red. (17) *Kesráj* (Wedelia calendulacea); root pounded with iron, dyes black. (18) *Ásan chhál* (Terminalia tomentosa); bark boiled, dyes black, brown, and buff. (19) *Mahuá* (Bassia latifolia); bark boiled with the bark of mango and *jámun*, dyes red. (20) *Palás tis* (Butea frondosa); flowers treated in the same way as (13), dye yellow-red. (21) *Bábúl* (Acacia Arabica); bark treated with alum, dyes fawn colour. (22) *Mendi* (Lawsonia alba); leaves, pounded into a paste and mixed with lime, are used for dyeing the palms of the hands and soles of the feet red. (23) *Dawá-ká-phul* (Grislea tomentosa); flowers steeped in a solution of alum, produce a red dye. (24) *Kath* (Acacia catechu); bark dissolved in alum and water, yields a dull red. (25) *Rori*, testa of seed ground up with water, dyes dull red. (26) *Giru* or yellow ochre, is an earth found in Bírú *parganá*. The same name is applied to a red ochre also found in the form of earth in *parganá* Korambe.

The following eight substances are used in tanning:—(1) *Dawá-ká-phul* (Grislea tomentosa); (2) *Amlá* (Phyllanthus emblica); (3) *Asan* (Terminalia tomentosa); (4) *Sál* (Shorea robusta); (5) *Hará phal* (Terminalia chebula); (6) *Bahera* (Terminalia belerica); (7) *Gáb* (Diospyros embryopteris); and (8) *Kend* (Diospyros melanoxylon).

Opium cultivation was introduced into Chutiá Nágpur Proper in 1869 by Mr T. F. Peppè, Sub-Deputy Opium Agent, and has very largely increased throughout the entire District during the last few

...rs. Up to 1869, the entire area under opium did not exceed ...8 *bighás* or 76 acres, all situated in the Subdivision of Palámau, ...hich until then was attached for opium purposes to the District ... Gayá. It was at first expected that considerable difficulties ...ould arise from the character of the uplands of the plateau, which ...ill not grow opium without copious supplies of manure; from ...he clumsiness of the people both in raising the plant, and in ...xtracting the drug from its capsule; and most of all, from the ...listaste for the cultivation caused by the oppressive conduct of the ... Opium Agency, which was at work in the District in 1833. ...It turned out that the alluvial soil of the Five Pa...s, ...e below the plateau to the east, was peculiarly ada...d for poppy ...ultivation. Even on the tableland itself, the deficiencies of the ...oil were compensated by a plentiful water supply derived from ...wells and natural springs (*dáris*), and lasting very late into the ...season; while the abundance of cheap labour was of itself enough ...to render the cultivation a success. In fact, the late Commissioner ...was of opinion that the introduction of opium into the Distri...has ...een an unmixed benefit to the people. It has not only given em...ployment to surplus labour in a country where no great public works ...are carried on, but has rendered the people less dependent on *mahájans* or village usurers, and taught them a system of garden ...cultivation which they would not otherwise have learned. At the ...same time, there appears to be no signs of the cultivators taking to ...the use of opium, as a narcotic.

The following statement illustrates the development of opium ...cultivation during the five years, 1869-74, in those portions of ...Lohárdagá and Mánbhúm which form the Opium District admini...stered from Ránchí.

OPIUM STATISTICS OF LOHÁRDAGÁ OPIUM DISTRICT, 1869-74.

Year.	Area sown with Opium in *bighás*.	Total Out-turn in *maunds*.	Total advanced to Cultivators, in Rupees.	Total paid for Produce, in Rupees.	Total Expenses of the year, in Rupees.
1869-70	1162	83	5,874	15,798	44,432
1870-71	2733	108	17,427	20,439	58,784
1871-72	3396	233	23,809	50,333	87,894
1872-73	5271	301	31,878	65,008	102,452
1873-74	5546	335	42,213	70,503	109,025

During the period to which the foregoing table refers, the area of ...nd under opium cultivation has increased from 1162 *bighás* or 387

acres to 5546 *bighás* or 1848 acres; while the total out-turn advanced from 83 *maunds* or 60 cwts. in 1869–70 to 335 *maun* or 245 cwts. in 1873–74. Taking the average price of a chest opium at Rs. 1200 or £120, the net profits of the Ránchí Agen have been as follows:—1869–70, £1437, 12s.; 1870–71, £170 1871–72, £7710, 10s.; 1872–73, £11,043, 16s.; and 1873–7 £12,797, 6s.

Tea Cultivation.—In the Statistical Account of Hazáribágh I have noticed briefly some conditions of tea-growing which seem t be peculiar to that District, and have contrasted them as far possible with those which prevail in Cachar and Assam. In Chut Nágpur Proper, there are no meteorological statistics accurate enou to form the basis of a similar comparison; but it is probable th the soil and climate here do not differ materially from those of the Hazáribágh plateau, while this District has the advantage in the matter of labour supply. Small differences, however, there certainly are. Thus, the soil of Chutiá Nágpur Proper is lighter and more friable than that of Hazáribágh, and runs down to a greater depth On the other hand, it is deficient in the alkaline properties of th soil of Hazáribágh, and contains more lime, the absence of which is said to be characteristic of the best tea-land. The rainfall of both Districts is virtually the same; but Chutiá Nágpur is less exposed to the hot westerly and north-westerly winds of April and May, and has a more copious dewfall than Hazáribágh. There are two tea plantations containing mature plants in Lohárdagá—at Hotwár and Palándu.

The Hotwár Tea Plantation is situated about three miles from Ránchí. The land forms part of the Barkágarh Estate, which was confiscated by Government at the time of the Mutiny. On the introduction of tea planting in 1862, a temporary lease, renewable from time to time, was granted to Mr Stainforth of Ránchí, and the garden is still held on this tenure. The average elevation of the garden is about 2100 feet above sea-level, and the total area of land available is 160 acres. Of this area, 35 acres were in 1872 under mature plants, and 25 acres under immature, while 100 acres of cultivable land still remain uncleared. The average yield is estimated at 91 lbs. per acre of mature plant. In 1872, the total yield of the estate amounted to 3200 lbs., all of which was made up as black tea.

Palándu Tea Plantation is situated about 12 miles to the east

Kánchi, at an average elevation of 2000 feet above sea-level, contains a total area of 184 acres, all of which was under mature ant in 1872. The land also forms part of the Barkágarh Estate, id is held on precisely the same terms as the last-mentioned antation. In 1872, the approximate yield of leaf amounted to 5,500 lbs., all of which was manufactured into black tea, showing average yield of 111 lbs. of tea for every acre of land under ature plant. In that year the manager reported that there were large cant patches in the garden, due to the effects of drought and heat, hile the soil was so poor that it had been necessary to use manure. he factory was supplied with labour from the neighbouring villages. uring the planting season of 1872, more than 250 men were em-oyed daily by the factory, besides about 150 women and children. len were paid Rs. 2 (4s.) a month, rising from Rs. 2-8 to Rs. 5-8 5s. to 11s.) for skilled workmen; women and children earned from hree-quarters of an *ánná* to two *ánnás* per diem, by plucking leaf at contract rate. A woman's ordinary wages are R. 1-8 (3s.) a month. There are several thousand acres of jungle close to the factory, which upplies charcoal for burning, and sumli *sál* timber fit for inferior uilding purposes.

AREA OF THE DISTRICT: OUT-TURN OF CROPS, &c.—The approximate area of Lóhárdagá District is returned by the Surveyor-General at 12,044 square miles, and this area was assumed to be correct for the purposes of the Census of 1872. The Subdivision of Palámau was surveyed by the Revenue Survey between 1862 and 1866; and a Topographical Survey of Chutiá Nágpur Proper was made between the years 1860 and 1868. The Deputy-Commissioner reports that in Chutiá Nágpur Proper the area actually under cultivation in 1871 was 3957 square miles, or 2,532,480 acres; the area lying waste, but capable of being brought under cultivation, 998 square miles, or 638,720 acres; while 2829 square miles, or 1,810,560 acres, consist of rock and jungle, and are incapable of cultivation. The foregoing estimate cannot be relied on, so far as it deals with the areas that are capable and incapable of cultivation. Chutiá Nágpur has never been subjected to a Revenue Survey; and Major Thompson, who conducted the Revenue Survey of Palámau, gives merely approximate estimates of cultivable and uncultivable land. No means exist of forming an estimate of the comparative acreage under the different crops. The Board of Revenue's return for 1868–69 does not give even approximate statistics on this point.

It is probable, however, that the area of land under rice cultivat exceeds that under all other crops put together. *Urid* (Phaseol Roxburghii) ranks next in importance, and *surgujiá* (Guizotia oleifer *til* (Sesamum orientale), cotton or *kapás*, and *maruá* follow in orde In Palámau, rice cultivation is almost confined to the more high tilled parts of the Koel and Amánat valleys; and the staple crops the Subdivision are oil-seed (*til*) and cotton (*kapás*). How impo tant these crops are to the *rayats* of the wilder villages, appears fro the fact that a peasant habitually speaks of his cultivation as his *ti kapás*; and these two crops are the security on which he gets ad vances from the village money-lender. The Assistant-Commissione of Palámau estimates the area of cotton lands in the entire Subdivi sion at 9600 acres, distributed among 1600 villages.

It has been observed, on a previous page, that the terms used i Chutiá Nágpur Proper to denote quantities of land do not corre spond to any determinate area. In consequence of this, no genera estimate of the average out-turn of a *bighá* of rice-land is available Two separate plots, however, one of first-class and the other o second-class land, were specially measured by Bábu Rákhál Dás Háldár, Special Commissioner under the Chutiá Nágpur Tenures Ac of 1869. Each plot contained $8\frac{1}{2}$ standard *bighás* or $2\frac{3}{4}$ acres, and was capable of receiving 6 *káts* or *maunds* of seed. The yield o the first-class land was found to be 5 *maunds* 9 *sers* of unhusked rice per *bighá*, or $11\frac{1}{2}$ cwts. per acre; while that of the second-class land was 3 *maunds* 35 *sers* per *bighá*, or $8\frac{1}{2}$ cwts. per acre. In spite of the difference of out-turn, both plots paid a rent of $13\frac{1}{4}$ *ánnás* per *bighá*, or 5s. per acre. The cultivators are reported to have said that both plots paid the same rent, because in good years their out-turn would be the same. But this can hardly be the case; and the most probable explanation is that the *rayat* who had the inferior land was indirectly compensated, by being allowed an extra quantity of upland. Second crops are not usually grown on rice-land; but occasionally barley, *musuri*, or gram are sown on the higher levels after the rice has been cut.

In Palámau, on the other hand, there is a recognised local *bighá* of 32,598 square feet, or nearly two and a quarter times the standard *bighá*, and about three-fourths of an English acre. The Assistant-Commissioner reports that a fair out-turn of paddy from two acres of land paying a rent of 9s. and 18s. an acre respectively

ould be 20 *maunds* and a quarter, or 14¼ cwts., and 42 *maunds* or
wts., value Rs. 15 and Rs. 31-2 respectively. A second crop
esárí dál (Lathyrus sativus) is generally taken from the former
riptions of land, namely, that which pays a rent of 9s. an acre.
average produce of this second crop is estimated at 6 *maunds*,
ue Rs. 3. No such crop is grown on the superior rice-land, which
ys a rent of 18s. an acre.

CONDITION OF THE PEASANTRY.—The Deputy-Commissioner of
hárdagá reports that, in Chutiá Nágpur Proper, a farm of upwards
33 acres, containing 22 acres of low land and 11 acres of upland,
uld be considered a very large holding for a single husbandman;
anything below 3½ acres, consisting of 1⅔ acres low land and
cres upland, as a very small one. A farm of 13 acres, of which
cres are low land and 5 acres upland, would be a fair-sized com-
able holding for the support of a cultivator and his family. But
alámau the proportion of upland cultivated is far larger than in
Nágpur Proper; and there, a farm consisting of 13 acres of
and 26 acres of high land, would be considered a large
a holding of one-third of an acre of low land and 3½ acres
very small or . A fair-sized comfortable holding in
d be about acres of low land, with from 8 to 10
Lo rdagá, a cultivator with a middling-
comfortably on a small holding
opkeeper, or a man drawing a
The Deputy-Commissioner, how-
of 13 acres a ltivator can sup-
une scale as drawing Rs. 8
Chutiá Nágp ordinary
to 7 acres o Palá-
who has no p
the *bhúa* syst
to deliver 2 *ma*
he fails to pay, th
d the transaction
vators, especially
in debt to the
of the process
be found in
dgpur, it may

the systematic consumption of fermented liquors, and the large sum spent in litigation by the agricultural classes, that their material condition is at present fairly prosperous.

THE DOMESTIC ANIMALS OF THE DISTRICT buffaloes, a few elephants and horses, goats fowls, ducks, and pigeons. The anim oxen and buffaloes, and a ver cows. Those reared f

	Rs.	a.	
	12	9	
	5	4	1
	8	0	0
	0	0	1
	12	3	1
	2	6	1
	2	6	0

buffaloes, goats, sheep, an average cow is pair of oxen, Rs. buffaloes, from sheep, from kids six r and a s to £

istrict ted b a s er

ánás, or 9d.; 2 chisels, 2 *ánnás*, or 3d.; 2 winnowing-fans, 1 *anná*, 1½d.; 2 baskets, 2 *ánnás*, or 3d.; 1 spud, 3 *ánnás*, or 4½d.; 4 [illegible] of twine, R. 1, or 2s.; 1 driving goad, 6 *pies*, or ¾d.; and 1 *jái bánghi*, 3 *ánnás*, or 4½d. The total cost of implements and [illegible] represents a capital of from Rs. 22-8 to Rs. 26-8, or from £2, 5s. to £2, 13s. In this part of the country, cultivators help [illegible] in other to a considerable ex[illegible]ping; if this were not so, [illegible]e sickles, &c., w[illegible] re[illegible]

WAGES AND PRIC[illegible]erably of late years from [illegible]eral causes, and [illegible]istances peculiar to Lohár[illegible]i District. The [illegible]ows the comparative wages [illegible]oolies, day-labourer[illegible]yers, and carpenters in the [illegible]s 1856 and 1870. [illegible]ous to 1856 no information [illegible]vailable. Wages are [illegible] risen to their present level [illegible]ost immediately after [illegible]1857.

WAGES IN LOHÁRDAGÁ I[illegible] THE YEARS 1856 AND 1870.

Year.	Coolies.	Day-la[illegible]	[illegible]s.	Bricklayers.	Carpenters.
1856	1 *ánná* or 1½d.	[illegible]	[illegible]*ánnás* to 4½d.	2 to 3 *ánnás* or 3d. to 4½d.	2 to 3 *ánnás* or 3d. to 4½d.
1870	1 *a.* 3 *p.* to 1 *a.* 6 *p.* or 1¾d. to 2¼d.	3 *p.* [illegible] to 1 [illegible] 1 *a.* 3 *p.* [illegible] 6 *p.* or [illegible]d. to 2¼d.	[illegible] 3 to 4 *a.* or 4½d. to 6d.	3 to 4 *a.* or 4½d. to 6d.	3 to 5 *a.* or 4½d to 7½d.

In rural parts of the Distr[illegible]ict the village carpenter is paid 10 *pailás* or *sers* of unhusked ric[illegible]e for every plough, while the village smith gets 20 *sers* per ploughsh[illegible]are.

The following table shows th[illegible]e prices per *mauná* of the more important food-grains in the years [illegible]859, 1866 (the year of the Orissa Famine), and 1870. No retur[illegible] prices can be given for any yea[illegible] previous to 1859, and even t[illegible]own below for that year canno[illegible] be relied on as perfectly acc[illegible]All the pric[illegible]es shown have bee[illegible] reduced to the standard *ma*[illegible]As the ub[illegible]Palám[illegible] differs so materially from Ch[illegible]lágpur Prop[illegible]appe[illegible] taining to it have been shown i[illegible] separate colu[illegible]

PRICES OF FOOD-GRAINS PER MAUND IN CHUTIÁ NÁGPUR PROPER AND PALÁMAU FOR THE YEARS 1859, 1866, AND 1870.

Name of Article.	1859.		1866.		1870.	
	Chutiá Nágpur Proper.	Palámau.	Chutiá Nágpur Proper.	Palámau.	Chutiá Nágpur Proper.	Palámau.
	R. a. p.	R. a. p.	R. a. p.	R. a. p.	R. a. p.	R. a. p.
Best unhusked rice	0	6	0 10	1 0 0	0 1 2	0
Best cleaned rice	1		1 8	2 0 0	0 2 2	
Common unhusked rice	0		14 1	0 10 0	0 0 11	
Common rice	1		3 12 2	1 4 0	0 1 8	
Wheat	1		4 13 0	2 8 0	0 2 0	
Barley	1		4 13 0	1 9 0	0 1 6	
Indian-corn	0 1		2 2 4	0 14 8	0 1	

In the rural parts of the D[istrict] ven in Ránchi itself, t[he] rise and fall of prices is indic[ated] riations of the size of the *pailá*, or measure holding ab[out] ht of grain. Rice [is sold] at the uniform rate of one pi[ce] but as the price rises, [the] size of the *pailá* diminishes. has some curious results. Disputes are continually occu[rring] e size of the *pailá*; and it is a common trick, while [measuring] ut *maund* of grain, to change the *pailá* for one of a sm[aller] that had previously been hidden in the sack. Thus also, instead of asking the current price of grain, a man will walk round the m[ar]ket and narrowly watch the size of *pailá* which different dealers are using.

WEIGHTS AND MEASURES.—The weights and measures made use of in Lohárdagá District are the following:—There are four kinds of *ser* weights prevalent—1st, the *sohrí ser*, so called from being equal to sixteen *gorakhpurí* pice in weight. Its denominations with their equivalents in English are as follow:—1¼ *sikkás* or *tolás* of 180 grains each = 1 *chhaták* = 8 drams avoirdupois; 4 *chhaták* = 1 *páo* = 2 oz.; 4 *páo* = 1 *ser* of 20 *tolás* or *tolás* = 8 oz. The *tolá* is the weight of one rupee. Second, the *athásí ser*, so called from its being equivalent to 28 pice. The[se] ghts are—2½ *tolás* = 1 *chhaták* = 1 oz., [4] *páo*, or [1] 4 oz.; 4 *páo* = 1 *ser* of 40 *tolás* = 1 lb. [7] ; 8 *paserí* = 1 *man* or *maund* of 4 ll[s.]; 8 *kachchá ser* [= 1] *tolás* = 1 *chhaták* = 1 oz. 13 drs. *hhc* oz. 12 drs.; 4 *páo* = 1 *ser* of 48 *tolás* = 1 lb. 3 oz. rs *aserí*; 8 *paserí* = 1 *man* or *maund* of 59 lbs. Fourth rd *ser*; 5 *tolás* = 1 *chhaták* = 2 oz.; 4 *chhaták* = 1

pão, or about 8 oz.; 4 *pão* = 1 *ser* of 80 *tolás* = 2 lbs. 0 oz. 14½ drs.; 5 *ser* = 1 *paseri*; 8 *paseri* = 1 *man* or *maund* of 82 lbs. The other denominations of weight are the same in name as those given above, their weight varying according to that of the *ser*. Grain is generally measured according to the following standard:—The *pailá*, which forms the basis of the measure, has two dimensions—one is called the *chhapáilá*, from its being equal to 56 old copper pice, or one standard *ser* of 80 *tolás*; 40 *pailá* = 1 *kát* or 1 *maund* = 82 lbs. The second is called the *sawáiá pailá*, which derives its name from being equivalent to one and a quarter of the *athásí ser*, and is equal to five-eighths of a standard *ser*; 40 *pailá* = 1 *kát* or *maund* = 25 standard *sers* = 51¼ lbs.

The current measures of time are as follow:—2 *dand* = 1 *ghari*, or three-quarters of an hour; 4 *ghari* = 1 *pahar*, or 3 hours; 8 *pahar* = 1 *din*, or day and night of 24 hours; 30 *din* or days = 1 *mahiná* or month; 12 *mahiná* = 1 *baras* or year.

Measures of distance are computed as follow:—About 440 *deg* or paces = 1 *guli* or gunshot distance; 4 *guli* = 1 *kos*, or about 5280 yards = 1 English league.

LAND-MEASURES, in the ordinary sense of the word, can hardly be said to exist in Chutiá Nágpur Proper, as the terms used to indicate amounts of land do not correspond to any uniform superficial area. Five different scales of measurement are current in that portion of Lohárdagá District, viz.:—(1) Uplands or *tánr* are measured by *káts*, each of which denotes the quantity of land which can be sown by one *kát* of seed rice, which in some places equals a standard *maund*, and in others a *kachchá maund* of 23 *sers*. The *kát* is again subdivided into 40 *pailás*, each of which is supposed to be the amount of land that will take a *kachchá ser* of seed. This system of measurement prevails under other names in the Tributary States; and in Singbhúm, the *khandí*, which precisely corresponds to the *kát*, has been reduced to a uniform superficial area, and forms the standard measure of the Government estates of the Kolhán and Paráhát. In Chutiá Nágpur Proper, however, the area of the *kát* has never been fixed, and an average *kát* is variously estimated at one-half to two-thirds of an acre, or from one and a half to two standard *bighás*. Within the same village the *káts* have a tendenc towards the same size, modified by the position and fertility of th land. (2) For rice lands situated on the central plateau of t District, the unit of land-measure in general use is the *páwá*. T scale of computation is as follows:—2 *kánis* = 1 *kanwá*; 2 *kanw*

= 1 *páwá*; 4 *páwás* = 1 *khári*; 8 *khári* = 1 *bhár*. The *páwá* is far less determinate in size than the *kát*, and ranges from the quantity of land that can be sown with two *káts* or *kachchá maunds* of seed to that which requires thirty-two *káts*. It is obvious that an average struck from quantities which vary so enormously could not serve any accurate statistical purpose, and I therefore do not attempt to show the average area of the *páwá*. Within the same village the *páwá* is supposed to contain a uniform amount of seed, but the size of the *páwás* varies considerably from the following causes:—First, the general, though not universal, custom is for the rate per *páwá* to be the same for all quantities of land, and the poorer *páwás* are therefore, by way of compensation, larger than the richer ones. Secondly, *páwás* which abut on *tánr* or highlands, though originally of about the same size, now differ in consequence of the holder of one *páwá* having enlarged his rice land, by terracing and taking in portions of the adjoining upland; while another cultivator has been content to keep his *páwá* as he got it. Thirdly, when new cultivators come into the village, the customary rent, like the customary price noticed above, remains the same; but the *páwá*, like the *pailá* in the case of price, is reduced in size. It is found, moreover, that enhancements of rents by the landlords are more readily agreed to by the *rayats*, if they take the form of a reduction in the size of the *páwá*, and leave intact the fiction that the rate of rent has never been changed. In the Fiscal Division of Dóisá, and in some other parts of the District, the term *ánná* is used instead of *páwá*, which is absent from the scale. The names of the subdivisions of the *ánná* and *páwá* vary very much in different villages. (3) In the eastern tract of country lying below the plateau, and known as the Five Parganás, the unit of measurement is again the *kát*, which, like the *khandí* of Singbhúm, is applied both to rice lands and uplands. The scale is—40 *pailás* = 1 *kát*, or the area of land which takes a *kachchá maund* of seed; 10 *káts* = 1 *bánd*. I may observe here that the *khandí* of Singbhúm is equal to a standard *maund*, while the *kát* of Chutiá Nágpur averages, as a rule, only 23 *sers*; so that the Singbhúm *hal*, containing 5 *khandís* of land, very nearly corresponds, as far as the test by seed is concerned, to the *bánd* of the Five Parganás. Another measure frequently used for land in this part of the country is the "rupee," which in its origin probably denoted the amount of land for which a rupee rent was paid. A "rupee" of land contains about three *káts*. A system of measurement by *ánnás* also

prevails in the Five Parganás; but I am unable to find out what is the precise relation that the *dúná* bears to the *bánd* or the "rupee." Not improbably, however, it is a subdivision of the latter. (4) In the Fiscal Division of Torí, *don*, or low-lying rice land, is measured by *pattis*, each of which is supposed to be equal to 3 standard *bighás*, or one acre. As a rule, however, the *patti*, though much less variable than the *khárí* of Chutiá Nágpur Proper, ranges in different villages from 2 to 4 *bighás*. Highlands in Torí are measured by a *bighá* of 32,400 square feet, or three-fourths of an English acre. Each *patti* is divided into 16 *ánnás*. (5) Alluvial land on the banks of rivers, where sugarcane is grown, has a special measure, as follows:—5 *pohrí* or cane-joints = 1 *gdí*; 20 *gdí* = 1 *pan*; 80 *pan* = 1 *kálian* = 8000 cane-joints. As the cane-joints are planted a yard apart, the superficial area of a *kálian* would be 8000 square yards, or 5 standard *bighás*. This measure is also used for tobacco land, simply owing to the fact that tobacco is grown on the same kind of land as sugarcane.

In Palámau, the local *bi* [illegible] District, and for highlan[illegible] Nágpur Proper. It co[illegible] equivalent to 2¼ stan[illegible]

DAY-LABOURERS.—[illegible] is no tendency in [illegible] distinct class of [illegible], neither renting nor possessing land. There are, however, the following three modes of employing labour, none of which confers the status of day-labourers on the persons who work under them. (1) On the *dhángar* system a labourer is hired by the year, and receives for the entire period either from Rs. 3 to Rs. 6 (6s. to 12s.) in cash with two *kachchá maunds* of grain per mensem, or from Rs. 15 to Rs. 18 (£1, 10s. to £1, 16s.) without any grain. In the latter case a large proportion of the sum is paid in advance as a bonus, and is invariably invested by the labourer. The *dhángar*, in fact, is generally a member of a joint family who renders service for a year, in order to earn a lump sum of money and thereby increase the family stock of bullocks and agricultural implements. If the investment is a success, and has not merely replaced, but added to, the fixed capital of the family, the *dhángar* will probably return to his home the following year. (2) *Sajhádárí*; a system of joint cultivation adopted in cases where one man has land without implements of tillage, and another has implements of tillage without land. Both cultivate the land and divide the produce equally

(3) *Pasridání*; a cultivator who has land but no ploughs or cattle, works three days in his neighbour's fields, and is paid by the loan of his neighbour's cattle and ploughs for a single day's work on his own land.

In Palámau there are large numbers of day-labourers who neither own nor rent land; and it is only of late years that the *kamiá* system of serf labour, described in my Statistical Account of Hazáribágh District, has begun to die out. *Begárí* or forced labour still prevails, and is a serious hindrance to the advance of cultivation.

SPARE LAND.—There is an enormous area of spare land in Lohárdagá District, but it is not held under any special tenure.

LAND-TENURES OF CHUTIÁ NÁGPUR.—The following account of the land-tenures of Chutiá Nágpur Proper is slightly condensed from a Special Report by Mr G. K. Webster, C.S., Manager under the Court of Wards of the Chutiá Nágpur estate, dated 8th April 1875; and so far as possible, the actual [illegible] d language of that report aturally into the following held direct from Gover lent on the estate. I s held from the estate g tenures. h the exception of a few villages belonging to the Rámgarh estate, the revenue of which is paid in Hazáribágh, the only estate in Chutiá Nágpur Proper paying revenue direct to Government is that of the Mahárájá of Chutiá Nágpur. The early history of the Chutiá Nágpur family is given at some length below. It will be sufficient here to state that the country was first reduced by the Muhammadans in A.D. 1585, the thirtieth year of Akbar's reign, when Mádhú Sinh, forty-fourth Rájá of Chutiá Nágpur, submitted to Sháhbáz Khán Kambú, and became a tributary (*málguzár*) of the Imperial Government. Again, in A.D. 1616, Rájá Durjan Sál, on falling into arrears of tribute, [illegible] by Ibráhim Khán Fath-jang, then governor of Behar, and sent to Gwálior, where he was detained for twelve years. On his release, he agreed to pay a yearly tribute of Rs. 6000, and received a grant of his estate on that condition. Chutiá Nágpur Proper was ceded to the British in A.D. 1765; but the first Settlement with the Rájá seems to have been made in A.D. 1771, by Major Camac, who granted a lease to Rájá Dripnáth Sáhí for a period of three years from A.D. 1772 to 1775, at an annual rent of Rs. (Benáres) 12,000,

luding *sayer* and *rahdárí*, or customs and transit duties; but not *...ngo rustum* or accountant's fees. The Rs. 12,000 consisted of ... *mál* or actual revenues, and Rs. 6000 *nazráná* or additional ... This is the amount stated in the lease, but in a copy of ... to a report of Major Camac's, dated 18th August ... found the rent stated at Rs. 10,000 *mál* and ... and this is the sum entered in the lease of A.D. ... deeds. It is not improbable that the sum of ... the revenue of the Fiscal Division of Torí bor- ... Hazáribágh District.

"In the lease of 1787 it is clearly laid down that the estate is saleable for arrears of revenue, and a similar provision is contained in the leases of later date. In spite of this, however, it has always been held, from reasons of policy, that the estate is not so saleable.

"The first lease granted to the Rájá appears to have conferred a permanent title, which did not need confirmation by the rules of 1793. But the point seems to have been raised as to whether, even under these rules, the assessment was fixed for ever; as I find that the Board of Revenue, in a letter dated 11th October 1790 held, in reply to a reference, that the Settlement was permanent ... Regulation I., 1793.

"In the leases granted to the Rájá, he was ... ponsible for the safe conduct of travellers and the recovery ... len property. No allowance was made, nor were any lands g... him for the purpose of defraying the cost of the police, n... is there any clause in any of the arrangements concluded wit... which can be construed as making him liable for a police con... ; yet in the year 1809 he was ordered to keep up pc... nd appoint watchmen. In 1841, he was empowered to call ... er-tenants to pay their quota of the expense. He filed ... e of the Governor-General's Agent a list of the under-t... ne rents payable by them, and an assessment (*bardóch*) ... nt. on the rent-roll was made by the Agent. The *thái* ... up by him till 1862, when the new police were intr... which date only a small fraction of this *bardóch* ... from the Rájá, though he still continues to coll... *irs*.

"Clearly, then, up to the end of last century the ... w considered as a feudal chief, and not a *zamíndár*; ... time civil and criminal process was unknown. When a crimina... to be arrested, a small detachment was always deputed; and ev...

the collection of the rents due to the Mahárájá by his *rákdárs*, which an assignment was granted to the *sazáwal*, or revenue a[illegible] a detachment was occasionally deputed to assist th[illegible] office[illegible] attempt seems to have been made to interfere in th[illegible] of the province until 1808, when disturbances in [illegible] ing from quarrels between the Mahárájá and h[illegible] tated the deputation of an armed force to q[illegible] establishment of the police in 1809 followed[illegible] management and payment of the police were left en[illegible] of the Mahárájá.

"The earlier leases, up to 1785 A.D., include the miscellaneous import and transit duties known as *sayer*, *rahdári*, &c.; but in the lease of 1787 A.D., there is a clause to the effect that a deduction has been made for *sayer*. I have been unable to find any record of such deduction. This estate does not appear in the list of estates in the Rámgarh Collectorate in which an abatement for *sayer* was allowed; and as the rental payable under the leases which gave to the *zamíndár* the right to collect *sayer*, and under those which expressly prohibited its collection, is the same, it is a fair deduction that no rem[illegible] was ever made. Mr Smith, Collector of Rámgarh, writing in 1[illegible], about the introduction of the *ábkári*, distinctly states that th[illegible] been no deduction. In that year, however, in spite of the [illegible]rájá's remonstrances, the *ábkári* or excise wa[illegible] taken from h[illegible] special pleading on the part of the Collector, wh[illegible] brought forw[illegible] improperly-attested vernacular order of 1790, t[illegible] prove that [illegible]e authorised and unauthorised *sayer* had bee[illegible] then resum[illegible]blished. The only conclusion one can come t[illegible] is, that the [illegible] been most unjustly treated in the matter. His estat[illegible]ssly exempted from the resumption of the *sayer*. The Re[illegible]d not apply,—not only the Settlement Regu[illegible] lation, [illegible]r ones, as Mr Cunynghame, Collector, on 9t[illegible] Octob[illegible]s to the Board that he has not exacted interes[illegible] on a[illegible]ue from the Chutiá Nágpur estates, as the Regu[illegible] latior[illegible]. After the introduction of the *ábkári*, th[illegible] Regu[illegible] put in force, but only partially, as up t[illegible] 839[illegible] had been sold in execution of decrees; and [illegible] the establishment of the Agency in 1834, it wa[illegible], up to that time, the sale law was almost unknown."

TENURES HELD BY RÁJÁS DEPENDENT ON THE ESTATE.—[illegible] estate may be divided into two portions—that comprised i[illegible]

the upper plateau, at an elevation of about 2000 feet above sea-level, and that lying on the slopes of the hills and the lower steppe, at an elevation of about 800 feet. A large part of the former is held by *jágírdárs* of various denominations, while the whole of the latter was, and most of it is still, in the possession of dependent Rájás. The tenures of these chiefs were not creations of the Maháráját of Chutiá Nágpur, but had been gained by conquest in the first instance, and were not completely reduced till the end of the last century. Tamár, indeed, was at one time subject to Orissa; and it seems probable that it was brought under subjection when the Chutiá Nágpur chief accompanied the Muhammadans in their invasion of Orissa. But Bundu and Ráhi were not finally reduced and made tenants of Chutiá Nágpur under regular covenants till 1793, when Major Fatner compelled their rulers to execute engagements to pay rents. Sillí appears to have been fully under the power of the Chutiá Nágpur estate some time before the country was ceded to the British, as some old papers show that rent was assessed on each village in that Fiscal Division. Barwá, or Barwé, was originally subject to Sargújá, and was not finally brought under the power of Chutiá Nágpur till A.D. 1799. The traditional origin of the Barwá family is as follows:—A Benáres Bráhman came on a visit of ceremony to the Rájá of Sargújá. It happened that the Rájá had gone out, but his bearer, a Chamár or leather-dresser by caste, was sitting close to the Rájá's seat. Now, the Chamár was dressed in the Rájá's cast-off clothes, and the Bráhman mistook him for the Rájá, and addressed him as Maháráját Sáhib. When he discovered his error, he begged the real Rájá not to let him fall under the imputation of having told a lie, and to make his words come true. So the Sargújá chief, in order to save the honour of the holy man, [illegible] his servant a Rájá, and settled him in Barwá. His descendan[illegible] with their old patron and went over to Chutiá Nágpur. [illegible]states are held under what are called *bhándowá pattás*, an[illegible]re of heirs-holder they escheat to th[illegible]gpur estate have already so fallen in. [illegible] held that created by the holders det[illegible] that of t was told that in some cases i[illegible]posite had record of such cases could, h[illegible]ound; an happened was that the Mahárája[illegible]red to regu the under-tenants, which he did [illegible]itute. The sors of Bundu and Tamár and Bar[illegible]e not legitim

of the men who were in possession at the time of the Permanent Settlement, so that now these tenures may be considered as creations of Chutiá Nágpur."

III. MAINTENANCE JÁGÍR AND OTHER SERVICE TENURES.—"As in all feudal estates, a large part of the country has been let out in *jágír* and other permanent under-tenancies. Before, however, entering on a consideration of the origin of each class of under-tenants and their rights and liabilities, I proceed to describe the general conditions which apply to all.

"*Inheritance.*—It is admitted on all hands that no woman can succeed to any under-tenancy, and that there is no succession through the sister's son. On default of heirs-male of the original grantee, the grant falls into the parent estate in the condition in which it was granted. The widow of the late holder is only entitled to a maintenance, proportioned to her rank and the value of the estate held by her deceased husband. This is an old and acknowledged custom, to which the Courts give effect, and is a consequence of the grants being all hereditary. The eldest son succeeds, and the parent estate is not obliged to enter the name of any sharer on its books; if it does so, it is an act of grace, and for this a *nazráná*, or fine, is always paid. The sharers may sue in the Civil Courts for a division of their property and get decrees, but the estate looks for its rent only to the eldest member of the family whose name is entered on its books. There is small doubt in my mind that, before our rule, only direct lineal descendants were entitled to inherit on the same terms as the last holders, and that at the furthest such right did not extend beyond first cousins; or if collateral heirs were allowed to succeed, they did so on payment of a large *nazráná*. Even yet in the Tributary Mahals this custom, I [illegible]re, prevails. A relation beyond the first cousin inherit[illegible] a higher rent than his predecessor.

nption.—Or[illegible]he Board of Revenue, on 92, wrote [illegible]*índár* might, at his option, *ágírdár*, e[illegible]is tenure, or lease it to his d rate. '[illegible]Revenue, Central Provinces, 1823, exp[illegible]nion that the decision of the whole of [illegible]as resumable on the death or rantee, wa[illegible]general. In fact, the power to ing at th[illegible]of the Permanent Settlement was away [illegible]e granted to Rájá Dripnáth Sáhi,

nor do I find that the Rájá has ever put forward any claim to resume such, except on failure of lineal heirs-male of the grantee. As regards later grants the question is different. Mr Cuthbert says, writing about Paláman, but his remarks apply equally to this estate:—'In all the hill *parganás* it has been the custom to grant *jágírs* to dependants and servants instead of money remuneration. Under the late Rájá and his ancestors offices appeared to have been considered hereditary, and most of the holders of these lands are the descendants of the original grantees. In some cases the Rájá appears to have resumed them at his pleasure, and bestowed them on others.' This was undoubtedly the case here, and for many years after A.D. 1790. The Courts, however, now refuse to allow the resumption of such tenures, even when service is no longer required.

"*Alienation.*—On this subject I can state positively that, under the custom of the country, a *jágírdár* has no right to alienate his tenure without the consent of the Mahárájá, and that any practice to the contrary which has grown up is entirely the product of our Courts. All the officers immediately connected with this District in the end of last century, and the early part of this, have recorded their opinions on this question; and I believe the only reason why there is any doubt on the point is that an early Collector of Rámgarh, in his jealousy for the power possessed by the Political Agent, tried to introduce the Regulations, regardless of the customs of the country, in the hope of thereby obtaining an influence over the people. The Courts, not allowing for the essential difference between the feudal service tenures here and the common under-tenancies in Bengal, which are entirely the creation of contract, have given effect to alienations; but the Mahárájá has invariably refused to admit that they are valid, unless made with sanction, acting on a letter from [illegible] of Revenue dated 28th [illegible]ember 1792. The people [illegible] All these [illegible]ey are aw[illegible]ers without sanction are inva[illegible] always tr[illegible]on the estate, for which they pay a large *salámí* or [illegible]te of the case at present is this: *jágírdárs* alien[illegible]y, sale, and mortgage, but the name of the old [illegible] the estate books, and receipts are given in his [illegible] failure of his heir, the tenure lapses to the estate [illegible] grances. It is not right that such alienations sh[illegible] the estate rents are thus rendered insecure. The [illegible] property in the soil, but only a limited interest, th[illegible]

sold for arrears of rent, and the original *jágírdár* often has no property from which the arrear can be realised.

"*Rakumát or Miscellaneous Cesses.*—In addition to the rent the following payments are made, some of which are collected in some *parganás* and some in others. (1) *Bardóch*, police contribution at 4 per cent. The Mahárájá was allowed in 1841 to collect this from his under-tenants, payable by all, unless especially exempted. (2) *Dák musháhará*, collection for the District post, levied from the under-tenants at Rs. 2-8-0 per cent. In 1863, when the contribution payable on this account by the estate was raised by Government, the Mahárájá tried to raise the rate to 5 per cent.; and about half the under-tenants now pay at this increased rate. (3) *Parkhái*, at 1 per cent., is supposed to be paid to the *poddár*, or treasurer, for the trouble of counting the rent. (4) *Típ rusúm salámí* is paid by each under-tenant, without regard to the number of villages held by him. *Típ rusúm* is said to have been imposed when the *ilákádárs* used to be much in arrears, and were made to give *tips* or promises to pay, the *tip rusúm* being taken for the trouble of writing the promise. (5) *Pánriái*, at Rs. 2-8-0 per cent., used to be taken by the *pánre* of the year, that is the officer who had charge of the records, and wrote the leases. (6) *Diwáni*, one per cent. to the *diwán*, one half per cent. to the *mahant* of Buddh Gayá. (7) *Mutsadián* or clerk's fees at Rs. 7-8-0 per cent. is paid only in the Fiscal Division of To[illegible]me Fiscal Divisions a cess called (8) *thákurái* is paid. Th[illegible]—*thákurái* proper, paid at the rate of R. 1 per vi[illegible]r-tenant to whom the Mahárájá gives *pán* on b[illegible]yá festival; and *tirbichái*, levied at the *Bijayá* [illegible]n the Mahárájá shoots an arrow, which Thákur [illegible] picks up, and gets in return an order to collect [illegible]age. In addition to these regular payments, a [illegible]r year was made from each under-tenant when [illegible]p his accounts, and was paid in the time of the [illegible] not been collected by the Court of Wards. Of [illegible]nt to the *diwán*, R. 1 to the *pánre*, R. 1 to the [illegible] to the Mahárájá.

[illegible]way in which rent was assessed was as follows:—The [illegible]ated land in each village was estimated, the unit [illegible] and as this rent was fixed at certain rates varying [illegible]s. 30 per *khári*, it seems probable that the only [illegible]ccount was the *rájhas* or rent-paying land. The

instalments in which rent was payable were the *panchá* (including the *sonamati*), the *mángni*, and the *hákimi*. I have made careful inquiries, but I have not been able to obtain the slightest information as to the date when rent was first imposed. I feel certain, however, that originally only the *panchá* was paid, which was probably expended in the expenses of the *Dasahará* festival. Afterwards, when intercourse with the outer world became more frequent, the expenses of the Mahárájá naturally increased, and the *mángni* was added; and at last, when a tribute was demanded from the country by the Muhammadans, the *hákimi* was imposed to meet the cost of the tribute. The old account-books are called *bahi panchá*; they contain no mention of the *hákimi* instalment, and the *mángni* is entered in some of them in irregular places, at the side or at the end of the accounts, as though it were an after-thought. The *panchá* was probably at one time Rs. 5 a *khári*. In a rent-roll of 1739, I notice that the *mángni* was increased. The rents of almost all the *jágírs* have been changed within the last hundred years. In 1788 A.D., I find that the *baráhil* or land-agent paid Rs. 25 per *khári*, thus divided:—*Panchá*, Rs. 5; *hákimi*, Rs. 10; *mángni*, Rs. 10. Between that time and 1792, an addition called *barhantá* was made, being generally equal in amount to the *panchá*, but in some cases only one-half of that sum. Again, between 1788 and 1811, there was an increase of three *ánnás* in the rupee of the original rent, and *báttá* for changing the *sikká* into the Benáres rupee was also added. In consequence of this change in the rent, there is scarcely a *jágírdár* in the country who holds on a lease of a date anterior to 1793. Some few of the *jágírdárs'* leases contain a clause that no more rent than is entered in them will be demanded, but most do not; so that if the Regulations apply, they would be liable to enhancement under section 51, Regulation VIII. 1793.

Mádat.—In addition to the rent and *rakumá*, the *tálukdárs* or landholders were liable to be called upon for *mádat*, a demand varying in amount and frequency, according to the necessities of the Mahárájá. It is undoubtedly one of the old feudal imposts, and it has been paid several times within the last twenty years. Indeed, it has been collected by the Ránís of the late Mahárájá, even since the estate has been under the Court of Wards.

Nazaráná.—As a rule, there is a fine payable to the superior on the succession to all under-tenancies, which in the case of the larger holdings is a fixed sum; but in general, the amount

in consideration of the value of the holding. This custom is dying out. No attempt to enforce it in the Courts has been made; and it cannot, therefore, be affirmed whether the demand would be considered legal or not. But as it is an incident to all feudal tenures, I should consider the demand legal, more especially as the Mahárájá at the time of the Permanent Settlement had no opportunity given him of assessing these customary payments, and consolidating them with the rent.

"The various classes of maintenance *jágírs* or other permanent service tenures are as follow:—(1) *Maintenance Grants.*—As the succession to the Ráj follows the custom of primogeniture, it became usual for the Rájás to allot maintenance holdings to their near relations. Such grants are entered in the old registers under the headings of Bháí, Thákurái, and Nágbansí *tolás*. Unlike similar grants in Pánchet and other parts of the country, they are hereditary, and only fall in on default of heirs-male of the grantee. Although not originally transferable, they are now commonly alienated. The general rules of inheritance noticed above apply to these tenures. The eldest brother of the Mahárájá is called Kunwar, and the next Thákur; the former is entitled to a grant of land, the gross rental of which brings in Rs. (Benáres) 10,001 a year, while the latter receives a grant of only Rs. 5001. These grants usually include some *debottar* and other service tenures; and on failure of heirs of these under-tenants, the maintenance holder can resume their villages, and take them under his personal management. The titles of Kunwar and Thákur are not hereditary; the sons are called Láls. The title of Kunwar has, I believe, never been continued, but that of Thákur nent of a fine for the honour. Thus, the Govind to a fine of Rs. 1000 on succession; and Jitn h paid Rs. 600 when he inherited his ten ers pay the customary *ábwábs*, with the except or fees for entering their names on the estate re cquiring their tenure, and the yearly *salámí* fe se maintenance holders have no right to deman property. The eldest son is the owner, and ntitled to maintenance from him. If the heirs maintenance holder fail, the grant reverts to mily, and the other heirs have no interest in

s, formerly called Khukrawar *tolás*.—These tenu

correspond to the *chéro* and *bhagtá* tenures of Palámau, whose origin is well explained by Mr Walpole in a letter dated 6th July 1809: 'In former years, long prior to the period when these provinces became subject to the dominion of the British Government, the Rájás and independent chiefs of bordering districts were continually engaged in broils and petty wars amongst themselves, attended by a rabble composed of all manners of persons armed in all manners of ways, whom the hope of plunder allured to offer their services. The ravages caused in consequence were so great, that it became necessary for the heads of the contending parties to contrive some method of keeping in a constant state of readiness and attendance a sufficient number of followers, not only for the purpose of defending themselves against sudden enterprises, but with the view also of having the power to make reprisals upon their neighbours. The method pursued in consequence by the Rájás gave rise to the now long established custom of bestowing lands in *jágír*, a feudal tenure, the very counterpart to those engagements which once existed to so great an extent in many parts of Europe. These *jágírdárs* obtained *sanads* from the Rájás for the grant of lands, under an engagement of feudal vassalage, or, in other words, of being at all times ready to assist the Rájá with a certain proportion of armed followers, whom they maintained upon their *jágírs*, either in the defence of the Rájá's country or invasion of neighbouring districts. From the time that the dominion of these provinces became vested in the British Government, the original necessity for the personal services of the *jágírdárs* gradually lessened. It was, accordingly, considered equitable that the *jágírdárs* should pay a certain yearly revenue to the *zamíndár*, in proportion to the value of the lands held by them, in lieu of the services formerly required. Agreements to this effect have in former periods been concluded between the *zamíndárs* and *jágírdárs*, which, however, were productive of no good effect, and only answered the purpose of fomenting disputes between the parties; and the *jágírdárs* have usually withheld what they pleased, which, as may be readily conjectured, was the whole. It may not here be irrelevant to observe that the *jágírs* have not been confined to the consideration of military services only. It has likewise been customary to bestow them as a mark of favour, reward and compensation for services previously performed, and on others, in the hope and expectation of future services of a miscellaneous nature. These *bárdiks* were

When they were first introduced I cannot say, but the ancestors of most of the men who now hold these *jágírs* are entered in the rent-rolls of 150 years ago. They must have come from the North-West, and they claim to be Rájputs. The services taken from them have now fallen into disuse. All that they are expected to do is to come to the Mahárájá when called, and always to be present at the *Dasahará* and other great festivals. In fact, as Mr Cuthbert said of Palámau, these tenures appear to be considered by their holders more in the light of *mukarrarí istimráris*, or permanent holdings at a fixed rent, than what are generally denominated *jágírs* in other parts of the country. The *báráiks* have a *chaudharí* or headman, who receives a certain yearly deduction from his rent called *siropá*. The *báráik* of Maka was formerly the chief, but of late years the *báráik* of Chaureá has taken his place. All orders to the *báráiks* were originally conveyed through him. When a call for *máldat* was made, he was the man with whom the settlement of the amount to be paid was concluded; he occasionally gave a written promise to pay the contribution, and he assessed the money among the other *báráiks*. Once in every three years the *báráiks*, like the *púrba páthá brittiás*, noticed below, used to give a contribution of Rs. 3000 called *tehsálí máldat*, but this has been discontinued for many years. They used also to give Rs. 3 per *bhárí* as *negi amlagán*, or fees to the clerks of the Mahárájá's office. A great many of the villages held on this tenure are *betalab*, *i.e.*, rent-free. Probably it was intended that the [illegible] of the armed retainers should be defrayed from their proceeds. There are also many *debottar* villages, but it is doubtful whether the proceeds of these are still devoted to religious purposes. *Adhik* villages are also included in the *báráiks'* [illegible]. The holders do not admit there is any difference between [illegible] title and ordinary *jágírdárí* conditions.

[illegible]s are divided into two sections, the *púrba páthá* and *pachhim páthá*; but I have been unable to learn what is [illegible]ween the tenures. They are of very ancient date, [illegible]y Bráhmans. It does not appear that they were [illegible]cial service; probably, all that the holder was [illegible] to be present at the chief festivals, and to pray [illegible]e Mahárájá on other occasions. The *brittiás* [illegible] and *negi amlágán* at the same rate as the [illegible]em, a *chaudharí*, who performs the same [illegible]able by the *brittiás* for *debottar* villages

was Rs. 30 a *bhárí*; and there was a deduction made to each *jágírdár* for *siropá*, at a rate of from Rs. 3 to Rs. 11 per *bhárí*. In 1792, an increase of seven *ánás* per rupee was levied from almost all. It was in general calculated on the total rent, before deduction of *siropá*, but sometimes on the balance, after the deduction had been made. In those few cases in which there was no *siropá* entered in the books of 1786, no increase was levied, and it is suggested that these were later grants. After this date, *siropá* was only allowed to the *chaudhárí*.

"(4) *Ameniák*.—The holders of these tenures are connections by marriage of the family of the Mahárájá, and most of them bear the designation of *bhayá*. In this class are now included the holdings of the *jamádárs*, most of whom are Muhammadans, which used to appear in the old books under the heading *sipáhí*. These *jamádárs* are bound to attend on the *zamíndár* and execute his orders. They usually receive a small pay when they were in waiting. Some of the *jamádár tolás* seem to have been at one time classed as *tupchí*, along with the tenures of the Mirdahas. These were granted in consideration of the holder keeping up a certain quota of *barkandázs*.

"(5) *Hujurhá*.—These seem to be what are entered in the old papers as *ohdár tolás*, probably because the tenure of the *diwán*, who was called *ohdár*, is entered under this head. It includes the service tenures of the *aiwán musáhib*, writers, *pánres* or record-keepers, *bakshís* or paymasters, cooks, *khawas*, *sahiní* or superintendent of elephants and horses, head *kapargharids*, *motí ojhá* or witch-exorciser, *kabirájs* or native physicians. Many of [illegible] of old date; and though at one time they m[illegible] able, they are now by custom not liable to re[illegible] services are performed.

"(6) *Bhittáná*.—The tenures of *khidmatgár*[illegible] barbers, gold and silver smiths, grooms, *chobdá*[illegible] palanquin-bearers, *khákis* or mendicants, and pros[illegible] this head. They are all service tenures, and th[illegible] waiting received pay like the preceding. These t[illegible] to be liable to resumption when service is no lon[illegible] are not alienable by the holders.

"(7) *Ghátwáls*.—The tenures of the *mánki* of *ganáit* of Pithauria, the *ilákádárs* of Bundu and Sil[illegible] *ghátwáli*. The holders are bound to keep the *ghát*s o[illegible]

and to furnish men to guard them. Their contracts are made with the Chutiá Nágpur estate; and, so far as I can find out, the Government has nothing whatever to do with them, nor could it under any law in force compel the *ghátwáls* to be kept up, though the estate could resume these tenures if they were not. Most of the men who guard the passes receive a monthly pay, but there are hereditary *ghátwáli* lands in Edalhátu and Timárá on the Bundu Pass, and in Kasidí on the Janáhá Pass. The tenure of the Janáhá *mánki* is one of the oldest, but he holds under a lease of a late date, and his rent has been changed of late years. His tenure is now entered under the *hujurhá* as a service one; and he holds two villages as *chibá birt*, which he says that he got before he was granted the *parganá* of Janáhá. The tenure of the *parganáit* is not so old as that of the Janáhá *mánki*; part of it, indeed, Garh Baragayá, he only obtained within the last hundred years. He is a Bhogtá by caste, and came from the North-West. The *parganáits* were officers who were entrusted with the collection of rents in a *parganá*.

"(8) *Bhayá* tenures are divided into three sub-classes, *bhayá* proper, *garh bhayá*, and *hujur bhayá*. They are found in Biru, Bassiá, and Baragayá. In the two former, the holders are Ráutiás, a sub-tribe of the Gonds; and in the latter, Bhogtás. All hold on terms of military service. The *bhayá* had to protect the estate and keep the passes, and it is probable that they were nothing more than subordinate *ghátwáls*. The *hujur bhayá* were bodyguards, and the *garh bhayá* were specially attached as sentries to the palace."

The following—(9) to (15)—are described by Mr Webster as [illegible] or leases," but they appear to amount to distinct [illegible]fore treated as such here.

[illegible]*i* is held on a lease which provides in the [illegible]nst any future increase of rent. Most other [illegible]his point; and it is a fair deduction that they [illegible]st all *jágírdárs* have been subjected twice during [illegible]ease of rent; and in a petition presented to the [illegible] Agent, the Maháráját expressly stated that the [illegible]ble to an increase of rent, proportioned to the [illegible]ation.

[illegible] *or Mortgage Tenures.*—Some of the *bandhik* leases [illegible] that the village mortgaged is to be held as an [illegible], but in most there is no such condition. There [illegible]or a long time in Palámau and Rámgarh, whether

he *zamíndár* could resume these and *birt* or maintenance tenures on payment of the *bandiápan*, or amount advanced, but I do not know how the dispute was decided. The holders of these tenures consider them just the same as any other *jágír*, and custom has probably entitled them to entertain this view.

"(11) *Tangor* villages generally belong to Bráhmans, and according to tradition were obtained in this way:—If a Bráhman failed in his attempt to get a village from the Mahárájá by fair means, and was willing to sacrifice himself for the benefit of his heirs, all he had to do was to betake himself to a village, taking care to select a good one, and deliberately hang himself therein. The only method of expiating the guilt of possessing a village in which a Bráhman had hanged himself, was by getting rid of the accursed spot, and giving it away in *jágír* to the heirs of the deceased.

"(12) *Chibá brit* is a rent-free tenure. Its origin is said to be as follows:—The Mahárájá, having finished chewing his *pán* or betel, threw it away. Some great admirer picked up the choice morsel and put it in his mouth, whereupon the Mahárájá, as recompense for his great devotion, gave him a village or two in *chibá brit*. They follow the usual conditions of maintenance tenures. There is generally a provision against any future increase of rent.

"(13) *Kusahá* tenures bear rent, and receive their name from a piece of *kusa* grass being given as a token of possession. They are held by Bráhmans.

"(14) *Debottar*.—Some *debottar* villages are i
all *jágírdárí* tenures of any extent; and even wh
formed the *jágír*, part of it was often set apart
The lease sometimes contains a provision that the
in the possession of the grantee and his heirs,
tinues to perform service. Strictly speaking, the
alienable; and when they are alienated, the alie
that they are held as *debottar*. Rent is paid by
these tenures. When the heirs of the original
tenure is often regranted without any stipulation a
debottar.

"(15) *Brith-bhandár* is held on a permanent le
the *zamíndár* being entitled to re-entry on failure
proper instalments. Some tenures of this nature h
by the *zamíndár*, notwithstanding that there were he
Courts have held that such resumption is not legal,

are hereditary. The rent of these tenures is inclusive of all *ábwábs*. No service is due from the holder. *Be-miádí*, *thiká*, and *ijárá* seem to be only other names for the same thing.

"(16) *Lákhiráj*.—There are a good many *lákhiráj* and *betalab* tenures, of which the holders pay *bardóch* and *dák mushahará*, but no rent or *salámí*. These include what are entered in the old papers as *athil tolás*, which were rent-free tenures granted to *fakírs*; and probably also *bráhmottar* villages, which usually pay no rent. Of late years the holders of *lákhiráj* villages have shown a desire to have rent assessed, as they have an idea that rent-free tenures are not legal."

IV. CULTIVATING TENURES.—"The conditions of the tenures on which land is held by the immediate cultivators are not constant throughout the estate, the character of the tenures depending on whether the bulk of the population is Uráon, Munda, or Bhogtá. Each of these tribes favours a well-defined and separate class of tenures, which merge into one another on the borders of the habitats of these races, and it is therefore necessary to treat separately of different parts of the estate.

"In the central portion of the plateau, extending from some miles east of Ránchí to some distance west of Lohárdagá, and including the *parganás* of Khukhra, Sutiambe, Jaspur, Umedanda, Deoikhand, Doisa, and Lodhma, in which the Uráon element predominates, the universal tradition is that the original clearers of the soil were the Mundas, who were afterwards driven to the south and east by an irruption of the Uráons from the neighbourhood of the fort of Koutás. The country was first divided into groups of from ten to twenty-five villages, called *parhás*, each under a petty Rájá. [illegible] being found clumsy, one head Rájá was chosen, [illegible]re now the possessors of the Chutiá Nágpur [illegible]ís and other Hindu tribes are evidently [illegible]s, although many of them held lands before British rule. In most villages they hold on[illegible] the aboriginal cultivators; but if there is any [illegible]rates, it is generally in favour of the *saás*, as [illegible] here, though justice would rather exact a higher [illegible]s they do not give *begárí* or forced labour, and [illegible] refuse to give the customary help in the cultivation [illegible]r *mánjhihás* land. The tenures of the plateau may [illegible]ree classes—(1) *Mánjhihas* or *mánjhas*, (2) *rájhas*, [illegible]. There has been some doubt as to the origin

of the two former names, but I think that a consideration of the process of the formation of a village, as it is still to be seen in *parganá* Torí, will give the desired clue. First comes the Bhogta (here it was the Munda), who clears jungle here and there for his *jhúm* cultivation, in which he sows cotton, &c.; and after cultivating the space for two or three years, deserts it to clear new and virgin land, whence he can with less trouble get a higher produce. When in this way a few acres have been cleared, the solitary *áhir* or herdsman appears on the scene with his herd of buffaloes, and builds huts for himself and his cattle in the clearing, the soil of which is gradually enriched by the manure from his herd, which are tethered at night at the *báthán* or grazing ground. When more land than gives sufficient produce for the *áhir's* requirements becomes rich enough to grow Indian corn, one or two settlers come and build their huts by the side of his; then generally some substantial cultivator, finding the land he has in his own village not equal to necessities, and looking about for a new home, thinks this spot, and offers the landlord a small rent for the right to make can of the place, and sets to work preparing low rice-lan he keeps for himself, the rest he gives on rent whom he thereby induces to settle; they prepare m village is founded. Sooner or later the landlord village can afford to pay a higher rent, and sends from him the amount of land in cultivati rent-free, and fixes rent on the remainder. is the *mánjhihas*, the rest is the *rájhas*. Th version of the rise of a village, but the pr somewhat similar in all times. The *mánjhihá angs* or share of the *mánjhí* (or headman); a Rájá's share.

"*Mánjhihas*.—The *mánjhihas* is always held lessee; if let out on rent, a higher rate than the *rájhas* land is taken. No length of occupation any right to the occupier. The landlord or his a feasible right to hold it *khás;* and he is entitled t *rayats* in its cultivation. Each must work for him ing, three days' digging, three days' planting, and t occasionally four days' work is the complement weeding is added. Some maintain that the landlor an allowance of food; but this is not customary,

of planting, when the women and children of the *rayats* assist, and they get an allowance, *báte*, equal to the amount of seed planted; and again at the h[illegible]st, a small sum is distributed as drink-money, *piyái*. When the [illegible] keep the *mánjhihás* in his own hands, an arrang[illegible]s made, under which the *rayats* cultivate the la[illegible] give a certain pre-arranged quantity of grain to [illegible] quantity of grain demanded by the late Mahé[illegible]n his lessees was 9 *maunds* of cleaned rice p[illegible] *irs* take as much as 100 *maunds* of unhusked rice.

"*Rájhas.*—[illegible]*jhas* tenures may be subdivided into *utakar, chatis*[illegible] *áswar, bethkheta*, and *korkar*.

"*Utakar*[illegible]s very nearly to the *utbándi* tenure of Nadiyá. [illegible] contains one *pawá* of *don* land alone, and that[illegible]or description. By the custom of the country, [illegible]on gives the holder any right of occupancy. [illegible]iable is entirely at the discretion of the landlord [illegible]actual money rent no cesses or *ábwábs* except *d*[illegible]d no *begárí* labour is due from the holder. *Utakar*[illegible] to pay lower rent than *chatisá*, and indeed [illegible]; but in some villages in which the *chatisá* rent h[illegible]l for a long time, a higher rent is paid than for[illegible] appendages. The names of the tenure are [illegible] its essence it has no permanence. *Balkat*, [illegible] written, is clearly *bálkát*, the long vowel of [illegible]mmonly shortened, as shown above in *mánjhi*-[illegible]e a corruption of *uttulkar*, as it is the later [illegible]. The holder paid rent (*kar*) for the land for [illegible]as cultivated (*uthit*), and in which he cut the [illegible] not in cultivation, no rent was paid. Though [illegible]lly in continuous cultivation, it is only in one or [illegible]y claim to a right of occupancy in this tenure is [illegible]ven then it is by aliens, who wish to introduce [illegible] the District.

iá.—The first name is derived, so goes the story, [illegible]ng obliged to c[illegible]bey the 'thirty-six' standing orders [illegible]The synonym *lekhá* is apparently an Uráon word [illegible]nt,' and means the land taken into consideration in [illegible]antity of rent-paying land in the village, and entered [illegible]name. Each *páwá* of *chatisá* generally consists of

one *páwá* of good *don* land with a complement or *lágán* of *tánr* (high land), varying in amount from 5 to 20 *káts*, according to the extent of such land in the village. The *rayat's* homestead and some *cherá bárí*, or rich high land near the village, are also included, and a consolidated rent is paid on the whole. In some villages two *páwás* of *don*, and in a very few three *páwás*, go to make up one *páwá* of *chatisá*. The chief *páwá* is called *máthá* or the head, [illegible]*thá* or the feet, and the third *mágiyá* or the middle. [illegible]*páwás* of *láthá* were included in one *páwá* of *chat*[illegible]rly an abuse. *Murile chatisá* is, as its name im[illegible] of its appendages, and one *páwá* of this tenure c[illegible] of *don* alone. It pays *chatisá* rents, generally witl[illegible]es.

"*Rights attaching to chatisá.*—I think t[illegible]ancy, independent of the length of occupation, [illegible] But the right to undisturbed possession is, unde[illegible] limited. If a new settler comes to the v[illegible] old settler who has a large quantity may [illegible] small portion for the benefit of the new com[illegible] more land than was necessary for the suppor[illegible] become less numerous than it used to be, [illegible] some to any man who had insufficient for [illegible] If a man who held a good deal of land [illegible] children, it was the custom to give part of [illegible] on the children growing up, they were conside[illegible] recover such lands. These customs are still [illegible] villages in which there are no alien settlers. [illegible] that a *zamíndár* has no right to turn out a [illegible] *máhato* or headman may, for the good of some[illegible] vator, deprive him of some of his land. Cla[illegible] fixed rents are often made, but I hold strongl[illegible] there is scarcely a village in Chutiá Nágpur [illegible] not been raised since the Permanent Settleme[illegible] of which I have seen old rent-rolls, I find that r[illegible] siderably raised during the last thirty years. I[illegible] was wild and half-cultivated, constantly subject t[illegible] Mahrattás, whose incursions continued even in th[illegible] old inhabitants who are still living, so that it would[illegible] sible for the cultivators to have paid at that time [illegible] they now pay. One of the Collectors of Rámg[illegible] A.D. 1820, notices the general rise in the rate of re[illegible]

and says, 'Land which a few years ago paid Rs. 2, is now paying Rs. 9.' Scarcely any land now pays as low a rate as Rs. 9. As far as I am aware, no suit for enhancement of rent has ever succeeded. Some have been tried, but either the notices have been defective, or owing to the *páwá* being an indeterminate measure, it has been impossible to prove that the defendant *rayat* was paying a lower rate than the mass uring *rayats* paid. The difficulty of getting proof iuce many years ago is notorious, so that the p the anomaly that the rent is liable to increa hanced through the courts.

" C s by inheritance, but there is, as far as I can l universal rule of succession. This much is settle inherit. Succession generally extends to the f then, if the brothers have separated for a oint whether the cousin is entitled to suc- ake the lands, a year's rent is often taken this question is at variance with that held otably by Mr Peppè of the Opium Depart- k there is a shadow of a doubt that no rable without the consent of the landlord. ve, even the *jágirdárí* tenures were not ori- *a fortiori*, the subordinate tenures were not. ys refused to acknowledge any transfer; and, the Koeris and other alien cultivators, who r their lands, no other class of *rayats* would m of this nature. The custom of the country is y such right, and it is solely owing to the de- hat it exists even in the limited form in wh the original cultivator continues in the village, ys rent through him, the courts do not allow a enure. This limited right is claimed by the the large villages in which there are Telís and never been clearly settled whether they possess not.

hing to chatisá.—The money-rent varies from Rs. 2 , varying chiefly with the size of that measure. In ney-rent, there are certain *abwábs* or determinate he different *parganás*. These are *dassain salámí*, at the *Dasahará* festival, generally 2 *ánnás* per mes at the rate of 2 or 4 *ánnás* per *páwá*. *Das-*

sain beheri is sometimes consolidated with the *salámí*, but is often separate, and is about the same in amount. It is also called *kárá bakri*, and is a payment for the purchase of buffaloes and goats given at the *Dasaharáj* to the Mahárájá. Each village gives one or two buffaloes and from one to six goats, the number depending on its size. These payments are made by all *rayats*, the following [illegible] by those holding *chatisá*:—*Urid.*—A certain quanti[illegible]ng from 3 to 20 *pailas* or *sers* per *páwá* of land, is ta[illegible]t for the *tánr* or high land cultivated with the *chat*[illegible] villages unhusked and husked rice and *surguja* are [illegible] *apás*.—Very commonly one *ser* of cotton is also ta[illegible]sual to take one *ser* of oil, either per house or per [illegible]here is jungle, each *rayat* who keeps his cattle in hi[illegible]ys one *ser* of *ghí*; but if the *áhir* has the charge of t[illegible] makes the payment. In some villages each *rayat* [illegible] has to give one goat at the *Dasaharáj*, or in defaul[illegible] *ánnás*. This is called *beheri*, a name which is also app[illegible]r payments. It is usual for each *chatisá rayat* to give [illegible]boos, and from 60 to 200 bundles of *kher* or thatchi[illegible] small rafters. This was primarily for the purpose of [illegible]eping in repair the granary or *bhandár* of the landlor[illegible]ages have increased in size, more materials are ge[illegible] than are required for this purpose, and the landlord [illegible] It is questionable whether he is strictly entitled to [illegible]em-ber a case where the demand was remitted on [illegible]ing together to keep the *bhandár* in repair. In so[illegible]e payments for *dák mushaharáj* and for *bardóch*, an[illegible]s those for *thákuráí* and *chándá* are assessed upo[illegible] addition to these *ábwábs*, which are apportioned [illegible] house, there are others assessed through the *máha*[illegible] These and the most usual are the *jhika* and *mangal* are two of the oldest *ábwábs*, and were, I believe, at [illegible] from most of the *iláká dárs*. Each village gives a go[illegible] *harái*, in addition to those mentioned above, which ar[illegible] *bakrá*, and are paid for at a stated rate of 5½ *ánnás* a [illegible] the *jhiká* nor the *mangal bakrá* are paid for, but their p[illegible] by the *máhato* among the villagers. The goat taken at [illegible] is called *jhiká* or 'seized,' as the landlord had the ri[illegible] on any goat he pleased. The *mangal bakrá* is give[illegible] manded. *Baitháwánghi*.—A thirteen *taki* rupee, ten

eight *pie* is given to the *máhato*, and the village has to give thirteen *támbis* of *ghi*; each *támbi* containing thirteen and a half *chhatáks* of standard Bengal measure. *Nishisht ghi and urid.*—For every rupee given to the *máhato*, the village has to give four *káts* of *urid* or eight *támbis* of *ghi*. The number of rupees given depends on the size of the village. This *ghi* is often taken from the *áhir*. *Moe Khund or Dádani.*—From eight *ánnás* to two or three rupees are given to the *máhato* of each [illegible] rupee six *támbis* of *ghi*, or four *káts* of *urid*, or fo[illegible]collected. These *ábwábs* are chiefly levied in the [illegible]*ir*, or home farm, and the two latter are, I think, [illegible] *Mángni*, *hártaki*, *bcheri*, or *tánrpan-dár*.—In vil[illegible]s a large amount of *tánr* land, and no attempt has [illegible]d out whether a *rayat* cultivates more *tánr* with hi[illegible]s entitled to hold, a *hártaki* is often imposed, es[illegible] and Lodhmá, at the rate of about 12 *ánnás* per [illegible]r house. Sometimes this extra payment is added to [illegible] being assessed per *páwá*, and it is then called *ma*[illegible].—Each *chatísá rayat* is also bound, as stated abo[illegible] days' ploughing, three days' digging, three days' pla[illegible] cutting, and one or two days' threshing and stor[illegible]e Hindus do not give the three days' dig-ging. T[illegible]*bhandár*, the *rayats* are bound to carry the *saiká* or [illegible]*ánjhihás* to the residence of the Mahárájá; and if [illegible] from this labour, they pay sometimes as much [illegible]ouse. They are also bound to carry *ban-ghis*, & [illegible] such labour in the year is considered a fair dema[illegible]et an allowance of food.

[illegible]—High land held in excess of the comple-ment [illegible] comes under this heading. From the nature of ti[illegible] of occupancy in the land can be acquired, as the [illegible]s rent for the year in which he cultivates it and [illegible]o rent is due for the years in which the land [illegible]t is payable in the kind of grain which is sown, and [illegible] following rates. For the quantity of land which [illegible]e *kát* of *gorá dhán* or high-land rice there is [illegible]*dhán*, and 1 *sup* or winnowing fan of the same. [illegible] rates are:—14 *sers surgujiá*, 14 *sers urid*, 16 *sers* [illegible], 20 *sers gondli*, and 14 *sers maruá*. Occasionally, [illegible]*ánnás* per *kát* is taken. *Máswar* is very rarely

paid for low rice land, but only for inferior *chaurá*, or land which gets little water.

"*Bethkhetá*.—In villages where the amount of *mánjhihás* is large, and the *saiká* arrangement is not in force, each *rayat* who is not a *bhuinhár* has a small piece of inferior low rice land allotted to him, varying from what requires 30 *sers* of seed to what ta[illegible] 2 *maunds*. For this he has to give more than the [illegible] of days' ploughing, &c.; in fact until the *mánjhi*[illegible] ompleted, he is not, as a rule, allowed to touch the [illegible] t is paid, and no right of occupancy can be ac[illegible] d. It is optional with the *zamíndár* to resume [illegible] for such land, if he does not require more than [illegible] of days' ploughing, &c.

"*Korkar*, otherwise called *áhriát*, *ha*[illegible] is low rice land which has been prepared from li[illegible] dividual exertions of the cultivator. The reclaime[illegible] cupancy in such land, from which he cannot be eje[illegible] ce. It is difficult to say at what rent the occupier [illegible] d, but I believe the custom is as follows:—After th[illegible] and he has had, say, one crop, he holds for three [illegible] at the end of the third year he has to pay half re[illegible] iversal custom, but it is, I think, not certain whethe[illegible] *utakar* or *chatisá*, as no *tánr* goes with *korkar*; hal[illegible] nerally meant, but *chatisá* rents are sometimes tal[illegible] three more years, in some parts full *utakar* ren[illegible] other parts, the land continues to pay half rents.

"*Rájhas rent-free tenures* are held for the [illegible] e ser-vants, or for the religious offices of the village[illegible] ready been described in the paragraph on Village Offi[illegible] 329).

"*Bhútkhetá*, or devil's acre, is a term inclu[illegible] other kinds of land, for some of which rent is paid[illegible] it is not; but the theory of this distinction is diffi[illegible] It seems, however, that when the land is troubled [illegible] ost of the holder's own ancestors, or any private[illegible] nt, rent is paid for the land. But if the spirit be o[illegible] ble power, who is prone to disturb the village gen[illegible] y the man who cultivates the land, then it is consi[illegible] or the well-being of the community that he should be [illegible] considerable expense is incurred in doing this, th[illegible] t off his rent. Private *bhútkhetá*, when the *bhút* is t[illegible]

third party, is not generally cultivated for more than three years by any one man. As *bhúts* arise in their generation, they will not allow a right of occupancy to accrue on their land, and do some damage to the adventurer who dares to try a fourth year's crop without doing *pújá*. *Mardháuá* is land which pays no rent, but it seems doubtful whether it is *rájhas* or *bhuinhárí*. I think with Bábu Rákhál Dás Háldár, that it is probably the private *bhútkhetá* of some *bhuinhár* whose family have died out; but that his *bhút* being a very wicked one, the landlord has been afraid, or has not been allowed, to turn it into *rájha* [illegible] cultivated it as ordinary *bhútkhetá*. The prod[illegible] to a feast, in which all the male inhabitants [illegible] each year. Every third, seventh, and twelfth y[illegible] of the *parhá* join in the feast. Some people t[illegible]s is not *bhútkhetá* at all, but is land set apart fo[illegible] of the *parhá* or communal group of villages. [illegible] of the villagers and landlords to the *páhni*, [illegible] the *bhútkhetá*, it is clear that so long as the r[illegible]bitants believe in the *bhúts*, the landlord has no [illegible]on any of this land. It is also, I think, clear th[illegible]ublic *bhútkhetá* having been set apart by the co[illegible]us services of a certain nature, no individual [illegible] to another religious persuasion has any right [illegible]s land; and that, if called upon by the owne[illegible]f the village, he is bound to give up any such [illegible]sion. The only question not clear to my [illegible] majority of the village turn Christians (a poss[illegible] hat is to be done with these lands?

[illegible]is is the third great division of the land. The hol[illegible]s are the *bhuinhárs*, who are supposed to be the [illegible]ose pioneers who turned the first soil in the vill[illegible]e so in the *parganá* of Khukhrá is questionable; for [illegible]he original clearers of the soil were Mundas, wh[illegible]y any Munda *bhuinhárs* in this part of the D[illegible] whole of the *bhuinhárí* tenures being held by U[illegible]ey have held the land for generations, they are p[illegible], and probably in almost all cases now cultivate t[illegible] ancestors reclaimed. They have a tradition that [illegible] half the lands of every village rent-free; but it is [illegible] whatever may have been their original right, they [illegible] that amount of land for generations. In an old

rent-roll of the *parganá* of Deorkhund, for A.D. 1712, I find that the proportion of rent-paying to *bhuinhárí* land was nearly as 5 to 1. This rent-roll also bears out Dr Davidson's statement that, in the first instance, the clearers of land were considered the owners, and only paid *sálámí* at festivals, and gave services to the Rájá; for no rent is entered against the *bhuinhárí* land, but in the collection accounts I find that all the *bhuinhárs* collected and paid a *salámí* of Rs. 50. The *bhuinhárs* are undoubtedly in many cases the descendants of men who were in the villages, when the Hindu *jágírdár* first obtained a footing in the country. Before that period, there being no landlord, there could have been no rent; and when the Hindu landlords came, they took from the villagers such services as they found most advantageous to themselves. These services must at first have been feudal, such as attendance at marriages, following the chiefs in war, &c.; but as the condition of the country changed, the services changed also, until they have resulted in the matter-of-fact demands now exacted. The calls made upon the superiors for money payments necessitated similar calls upon their inferiors; and in process of time, probably within the last 100 or 150 years, half-rents were imposed. As the necessity for the services lessened, the landlords cast covetous eyes on the fair lands paying low or no rents; and not content with the slow work of death which swept family after family away, and brought their *bhuinhárí* lands into the *rájhas*, they set to work by various devices to oust a great proportion of the *bhuinhárs*. Their act, however, brought their own punishment. The imposition of half-rent gave rise to the cry of *Adhá dám ádhá kám*, which caused the Christian *bhuinhárs* to lay claim to half the land of the District. When imbued with a spirit of independence, instilled into them by the Lutheran missionaries, they learnt that they too had rights and privileges; and waking from a long sleep of apathy and submission to the illegal exaction of the *jágírdárs*, they turned the tables on their old masters, and took forcible possession of large quantities of land to which they had not the remotest title. The riots resulting from this attempt necessitated the passing of the Chutiá Nágpur Tenures Act, for the determination and measurement of the actual amount of land held under this tenure and the *mánjhihás*, *bethkhetá*, and *páhni*."

Chutía Nágpur Tenures Act, 1869.—It may not be out of place to note briefly the state of things which led to the passing of this Act. Up to the year 1857, the policy of the principal and subordinate

holders, with regard to the occupants of *bhuinhárí* lands, was to aggravate in every way the pressure of the conditions, whether of service or of money payments, on which those lands were held; and to take any opportunity that occurred of extending the boundaries of the *rájhas* lands, or of claiming *bhuinhárí* lands as an escheat, when their occupant happened to leave the village. After the Mutiny, however, the Christian Kols who had been compelled to desert their villages and take refuge in the jungles, received assistance from the Relief Fund to enable them to recultivate their lands, and the number of converts largely increased. They, therefore, assumed an independent attitude towards the *zámindárs*; and when the usual disputes arose at the reaping of the winter harvest, the *rayats* took the law into their own hands. After some serious riots had occurred, Lál Loknáth Sáhi was appointed to hold a summary inquiry into the matter, and to record the *bhuinhárí* rights in 500 villages where the discontent of the cultivators appeared to be strongest. He had, of course, no judicial authority; but the mere fact of the inquiry going on satisfied the cultivators, and the riots stopped. In 1862, however, Lál Loknáth Sáhi died; and the power of passing summary orders in Non-Regulation Provinces had in the meantime been taken away by the Indian Councils Act. Disputes, therefore, recommenced. The general discontent continued to increase till the 21st September 1867, when a petition purporting to proceed from 14,000 Christian Kols was presented to the Lieutenant-Governor of Bengal, complaining that the Mahárájá of Chutiá Nágpur had cut the petitioners' crops, and dispossessed them of their ancestral privileges. This was forwarded to Colonel Dalton, then Commissioner of Chutiá Nágpur, for report, and referred by him to Mr F. Batsch, the senior missionary. In a letter of November 1867, Mr Batsch, while disowning the petitioners, pointed out that both the Christian and the unconverted *bhuinhárs* were continually dispossessed by the *zamindárs*, who in most cases were supported by the police. Nothing, he added, short of an authoritative settlement of the question by Government, could stop the cultivators from appealing to personal violence. To supply such a settlement, the Chutiá Nágpur Tenures Act was passed in 1869. The characteristic provisions of that Act may be summarised as follows:—*Bhuinhárí*, as defined in the Act, includes the four cognate privileged tenures known as *bhátkhetá*, *dálikatári*, *páhni*, and *máhtoái*; while *manjhas* or *mánjhihás* includes *bhútkhetá*. The jurisdiction of the regular courts

is barred; and Special Commissioners are appointed to demarcate and register the tenures which come under the Act, subject to appeal to the Commissioner of the Division. Pleaders (*vakils*) and law agents (*mukhtárs*) are not allowed to be heard without special permission. The term of limitation is fixed at twenty years, and the service conditions of *bhuinhárí* tenures are allowed to be commuted for a money payment. At the same time, no date is fixed within which such claims to hold land on a privileged tenure must be put in. In consequence of this omission, and the impossibility of commencing the work of demarcation in all parts of the District at once, it is feared, that when some of the more remote *parganás* are visited by the Special Commissioners, serious difficulties may arise.

On the general effect of the Tenures Act of 1869 and the rules passed for carrying it out, Mr Webster writes as follows:—"The rules passed under this Act have, to some extent, altered the conditions of the *bhuinhárí* tenure; and will, I regret to think, have the very effect which the Act was specially designed to prevent, viz., the elimination of the old hereditary Kol cultivators. I already see this process in operation, but it is to be feared that the evil is now past remedy. The rules introduced two new features, which are the direct cause of this evil. First, they allowed these tenures to be transferred, whereas they were only hereditary within limited degrees of relationship; and secondly, they permitted the services to be commuted to a money payment. The Kols are a drink-loving and careless people; many of the *bhuinhárs* will get into debt, nay, are already involved, and will transfer their tenures by out-and-out sale to the *mahájans*, who are no longer deterred from buying the lands by the fear of being called on for personal service. The Christian *bhuinhárs*, who are more careful, may, perhaps, retain their lands; but there is, in my opinion, little hope for the unconverted ones. When a *bhuinhár* left his village, he used to make over his lands to his landlord; and the custom was that, whenever he or his heirs returned, his landlord was morally bound to restore them to him. If he was away a long time, a *nazráná* was often exacted, and sometimes only a portion of his land was restored to him; but this was considered a breach of faith. He did occasionally mortage his lands, but, so far as I can learn, invariably to his landlord, or with his landlord's consent. The first alienation to a stranger occurred, I believe, some forty years ago, and the question was tried in court and decided against the landlord. The alienation was only a mortgage, not a

sale. The commutation will be a serious loss to the landlord, as rates of wages will rise all the quicker on account of the commutation, and he will have to pay for the amount of services which the *bhuinhárs* used to give him twice or thrice the sum he has been allowed as compensation. Another change made by the rules was to fix the amount of burden-carrying at fifteen days in the year, and to limit it to the Province. Before the Act was passed there was no limitation except the temper of the *bhuinhárs*, and the right was liable to great abuse. In some cases, the *jágírdárs* took their *bhuinhárs* with them as far as Benáres; but if these calls were often made, I think, as an offset, the *bhuinhárs* were released from other demands, and not made to pay half-rents.

"The liabilities of these tenures are now—the rent, if any, paid at the longest time before the passing of this Act, not exceeding twenty years, of which proof can be got. The usual amount of ploughing is given as if by an ordinary *chatísá rayat*; 15 days' burden-carrying in the year, with an allowance of food; 100 bundles of grass, 20 bamboos, and 2 small timbers. These are the normal services; but they are subject to slight variations in different villages. I should also notice that in many villages no *tánr* went with *bhuinhárí* land; but an arbitrary rule has now been made that *tánr* ought to go with *don*, and to each *páwá* of *don* a small amount of *tánr* has been decreed. There is one other service taken from *bhuinhárs* called *egrú*. Every village is bound to send one or two men to the landlord, to assist him in building and thatching his house. The time for which they are bound to work varies from seven days to a month. In default of such service, the *bhuinhárs* pay from Rs. 3 to Rs. 12 per village. In the *parganáits'* villages in Sutiambe, for each man not sent, Rs. 3 and 18 *kats* of *dhán* are given to the landlord."

Khunts.—The *bhuinhárs* of a typical Kol village are divided into three *khunts* or stocks, called the *múnda khunt*, the *múhato khunt*, and the *páhn khunt*. This division into families corresponds to a division of the *bhuinhárí* lands; and it has been conjectured that the system was introduced by the Hindu landlords, in order that the *bhuinhárí* lands might become *rájhas* by instalments, as each *khunt* became extinct, instead of continuing *bhuinhárí* until all the *bhuinhárs* in the village had died out. Mr Webster, however, thinks it more probable that the *bhuinhárs* of each *khunt* are the descendants of the men who held the offices of *múnda*, *máhato*, and *páhn*, when the Hindus came in. The word *khunt* appears to mean a genera-

tion or family, and its use is closely analogous to that of *stirps* in Roman law.

The following paragraphs, describing the Land-Tenures in *parganás* Torí, and Obá, and in the tract known as the Five Parganás, continue the quotation from Mr Webster's Report, cited *supra*.

"TENURES IN PARGANÁ TORÍ.—The bulk of the inhabitants of the *parganá* of Torí are Bhogtás; and the tenures of land differ greatly from those in Khukra and the upper part of the plateau. There are no *bhuinhárs*. The arrangement called *saikà* is, I believe, unknown. There is no *bethkhetá*, though there is *mánjhihás*; and the villagers are not liable to give the same amount of *begárí* or forced labour as the Uráons do, so that, as a natural consequence, the rents are higher. The system prevailing is as follows:—The *don* or low rice land of the village is divided into *pattis*, each of which is supposed to contain three *bighás*. The actual area of the *pattí* varies from two to four *bighás* in different villages; but though here and there in a village some old or some powerful *rayat* may be found to be enjoying a larger quantity of land than he is entitled to, as a rule the *pattí* varies less than the *páwá*. With the *pattí* is incorporated a certain quantity of *bárí* or homestead land, including the house of the cultivator, and from 8 to 16 *mahuá* trees,—the whole forming the *jíbat*, corresponding to the *chatisá*, on which rent is paid. In general, where the portion of *don* is fully three *bighás*, one *bighá* of *bárí* is included; if less than this, one *bighá* of *bárí*, and one of *bhitá* or high land, go to make up the *pattí*. Occasionally the *pattí* contains no *don*, but is made up entirely of *bárí* lands. In some villages, the *bárí* has been regularly measured and apportioned to the *rayats*; in others, a piece of land is pointed out (*ángur batás*) to the *rayats* as a *bighá*; but in both cases, any man holding more *bárí* than the quantity belonging to his *jíban*, has to pay rent for the excess at the rate of R. 1 per *bighá*. This is called *utakar* rent. No rent is charged for outlying *tánr* land, called *báhir chaur*, or outside the cow path, which does not get manured, nor for new cultivation in the jungle by villagers; but outsiders are charged for *dáhá* or *jhúm* lands, where the jungle-burning system of tillage is resorted to, at the following rates:—1st year, called *dáhá*, R. 1 per *bighá*; 2d year, *khirkí*, 8 *as.* per *bighá*; 3d year, *murhí*, 4 *as.* per *bighá*; and subsequent years, *dhurhí*, 2 *as.* per *bighá*. These rents are also called *utakar*, a term which is locally applied to all rents which are not *jíban*. *Don* lands are never actually measured; the *bighá* in use for *bárí* is one

having a side of 20 *lagís* or poles, each *lagí* being about 9 feet. The *lagí* is commonly made by measuring 5 cubits from the elbow to the end of the middle finger, and one from the elbow to the tip of the closed fist. Rents vary from Rs. 6 to Rs. 12 per *patti*, but Rs. 8 is the standard rate. In addition to the money-rent, there are many *negis* or cesses rated per house, so that the rate per *patti* falls heavily on a man holding a small amount of land. The commonest are—1 *kachchá ser* of *mahuá* oil per house; 1 *ser* of *harná*, a sort of bamboo pickle; 1 *birni* or bamboo broom for sweeping the *bhandár* or granary; 1 *ser* of cotton; and 1 *ser* of *ghi* per *patti*. Very few *rayats* have a right of occupancy; and it is only within the last few years that even those, who are legally entitled to it, have made the claim. The Bhogtás are a migratory race; and the proprietors, in order, apparently, to prevent the accrual of any right of occupancy, move the *rayats* from one plot of land to another. Rents have been raised in all villages within the last few years, and are much higher than in Chútiá Nágpur Proper. All *kusúm* trees belong to the *zamindár*, who takes a rent of from 4 to 8 *ánnás* per tree, for the liberty of cultivating lac on them. Low rice land, which the cultivator has prepared himself, is generally left in his possession, unless he was a lessee of the village at the time, and then he is often dispossessed on the lease being taken from him. No special advantages are allowed to the reclaimer of land. If he is allotted the proper share of *mahuá* trees and *bári* which fairly belongs to the land he has terraced, he pays the usual *jíban* rents; but till this is done, he pays somewhat lower than this, and no *negis* or cesses. He is generally allowed to hold it free for three years, then at half *jíban* rates for three years, at the end of which period he is liable to pay full rates. Occasionally another plan is adopted; R. 1 per *patti* is charged the first year, Rs. 2 for the second, and so on till the full rate is reached.

"Tenures in Parganá Obá.—The tenures in the immediately adjoining *parganá* of Obá are nearly the same as in Torí, with this difference, that the *patti* in average *don* land contains 2½ *bighás*. The mode of allotment also differs. In Torí, land is assigned on what is known as the *sajnij* system, a certain proportion of good and bad land being included in the *patti*. But in Obá, one *patti* may consist entirely of good and another entirely of bad land; while the difference is equalised by making the size of the *patti* vary inversely with the quality of the land.

"The Tenures in the Five Parganás, that is, the *parganás* of

Tamár, Bundu, Silli, Rárhi, Baranda, require to be separately treated, as in them we meet with the *múndas* and *mánkis*, who are undoubtedly the descendants of the original chiefs, and have still possession of the villages which their ancestors founded. The *múnda* is the hereditary head of the village; the office descends from father to son. It seems that in former times the lands of the village were actually divided among the children of the *múnda*, the eldest taking a larger share and acting as chief. This is the only method of accounting for the varying number of *khunts* or stocks, into which we find the villages divided. As mentioned above, a *khunt* is a stock or division of a family. But from a partition of the land always accompanying a separation of the family, the term *khunt* came to be used for either the portion of the land or the family; and even *rayats* who are no relations of the leading family will say they belong to a certain *khunt*, meaning that they hold land in the division of the village belonging to that *khunt*. The probability is that in old times each of these *khunts* paid such a sum, or gave such services, that the total amount paid by all the *khunts* equalled what was due to the superior by the *múnda*. For many generations, however, the custom has come into vogue of giving maintenance grants to the younger members of the family, which are called *bábuán* lands; rent being paid for them, but at a lower rate than ordinary *rayats* pay. Serious riots have more than once resulted from attempts to interfere with the *mánkis* and *múndas*. It was held by, I think Sir T. Wilkinson, that 'It is clearly ascertained that the lands in the possession of the *mánkis* and *múndás* are hereditary clearings; that they have never paid variable rents; and that, excepting receiving rent, the *zamindár* has no other right or power of control.' In conformity with this, *pattás* or leases were granted by the Rájás of Támár and the other *parganás* to the *mánkis* and *múndas*, confirming their titles, and fixing the rates of rent payable by them for ever. These *pattás* were signed by Sir T. Wilkinson. It is doubtful whether the *múnda* has a right to alienate his village. Some of the most experienced officers have thought he could not; but they do alienate, and the transfers are upheld. A *mánki* is the chief of a circle. Twelve is the number of villages considered the proper appanage of a *mánki*, but some have more than double that number. A *mánki* is only entitled to collect the fixed rents payable by the *múndas*. *Máswar* is levied on excess high land, and excess *bárí* land is also paid for. *Dassái thánd kharchá* or *bardóch* for police purposes and *dák musha-*

hará are always paid by the *rayats*, who also pay one *ánná* per rupee to the *chákládár* or collecting officer of the Tamár *pradhán*. There is no *bhuinhárí* land in Tamár, the owners of the villages being generally themselves the *bhuinhárs*. The only village officer is the *páltu*. He holds from one to five *káts* rent free as *dálikatárí*. The *múnda* sometimes has a chief officer called *díwán*, and a *bhandárí* or landlord's agent is also met with. They receive either pay or land. *Baibalía* corresponds to *korkar*, and the remarks on that species of tenure apply here. The rent eventually payable is that considered by a committee of five men to be fair and reasonable. It is said that the Kurmís claim a right of absolute transfer of *baibalía*, but I doubt if the custom is universal. All new *rayats* are liable to have their rents increased; but the rent of a *khunt* taken from a *khuntdár* or of *bábuán* lands is, I believe, fixed for ever.

"*Khunt-khatti* tenures are commonest in these southern *parganás*. They may be divided into two classes, the new and the old. The latter are the product of customs; the former, in many cases, of written contract. The holders of these tenures may be of any caste or class. They themselves or their ancestors settled in the jungle, and by their own exertions brought the forest-land into cultivation. The rights claimed by them arise from the custom originally prevalent in Chutiá Nágpur Proper, that the clearer of the soil was considered the owner. They claim to hold at fixed rents, on a hereditary and transferable tenure. The older class are nothing less than somewhat modern *múnda* tenures, and are, I think, held on the same terms; but the more modern ones, some of which are held on written *pattás*, giving the holders permission to cultivate a piece of waste ground, are not entitled to any such privileges."

Land-Tenures of Palámau.—The following account of the land-tenures of the Palámau Subdivision, is slightly condensed from a Report on the subject, by Mr L. R. Forbes, Assistant-Commissioner of Palámau:—

The Subdivision of Palámau embraces the three Fiscal Divisions of Palámau, Belaunjeh, and Japlá, the tenures in each of which will be separately treated. The Fiscal Division of Palámau itself is further subdivided into fifty-five *tappás*, and some of the smaller of these are again grouped into circles called *chaklás*. From the vague wording of some of the earlier documents on the land administration of the country, Mr Forbes infers that all the larger *tappás* and the present *chaklás* were at one time separate *parganás*. For Pundág,

one of the largest of these *chaklás*, is used in the *Ain-i-Akbarí* as a synonym for Palámau, and reappears as Pendách in the "Fifth Report" (Madras Reprint, 1866, p. 518). The *tappás* may at one time have constituted separate estates, but have ceased to do so now.

THE SUPERIOR LAND-TENURES of Palámau, with their present number as estimated by Mr Forbes, are the following:—"(1) *Jágír Bábuán;* maintenance grants made by the Máhárajás of Palámau to their near relatives. Some of these grants were hereditary, and others not; but none were alienable, and, in default of male-heirs to the grantee, the lands reverted to the Mahárájá. Estimated number, 58. (2) *Service Jágírs;* grants made in lieu of payments for various civil, military, or political services rendered; some were hereditary and others not; number, 446¾. (3) *Jágírs kánungo and kázi;* grants made in virtue of the office held, and in lieu of official salaries; number, 37. (4) *Jágír cheroán, kharwár and bhogtá;* all similar tenures, being grants made as rewards or in return for military services, to those tribes who were the original soldiers of the *parganá;* number, 1022½. (5) *Jágír inám;* grants for services rendered during the rebellion of a Chero *sardár* in 1802 A.D.; number, 109½. (6) *Jágír mutafarrikát;* simple *jágírs*, for which no special terms or conditions are laid down, except the fixed amount of quit-rent; number, 21. (7) *Ijárá;* tenures under which villages are held on lease for a specific term of years; number, 10. (8) *Ijárá khairát;* charitable grants, 23 in number. (9) *Ijárá mukarrarí;* grants that have descended from father to son for many generations, without any variation of *jamá* or rent; number, 3. (10) *Ijárá bai pattá;* grants for lands that had been purchased out-and-out by the occupants, 90½. (11) *Ijárá jágír and inám;* rewards granted for miscellaneous services, 20. (12) *Ijárá jamá brit;* grants held under mortgage, 5½. (13) *Minhái mahals;* as the term implies, rent-free holdings given for various reasons, but generally as maintenance or charity grants to *fakírs* or religious mendicants, Bráhmans, Bháts, &c.; 502 in number. (14) *Deori and khálsá mahals;* the lands that were reserved by the Rájá for the Ránis, or for his own immediate wants. These lands became, and still are, the Government villages; 402 in number."

"All the foregoing tenures were created by the Cheros who began their rule in Palámau in 1613, as independent chieftains owing allegiance, it is believed, to no one. About fourteen years later, they became subject to the Muhammadans, who treated the country as a

tief, and whose sole interference consisted in the exaction of a yearly tribute. In 1773 A.D., the *parganá* was taken possession of by the British Government, and treated as a Tributary Estate, the Settlement which took place at this time being made by Mr Camac, the Government Agent at Patná. After this Settlement, the *parganá* was much disturbed by disputes among the different branches of the ruling family; and in 1784 A.D., Churáman Rai, the last of the Chero Mahárájás, succeeded to the *gádi* or State cushion as a minor. Sheo Pershad Sinh, one of the *thákuráis*, or relatives of the chief, became regent; and the *sanad* was drawn up in his name, the most curious part of which is that no mention whatever is made of the Mahárájá himself. In 1789 A.D., a second Settlement was effected, which has since been known as Mr Mathew Leslie's Settlement. This officer not only settled the revenue payable by the Mahárájá to Government, but he also drew up a list of the *jágírdárs* and other tenure-holders, fixing the *jamá* payable by them to the Mahárájá. At the same time he prepared a general register of estates and made a settlement of the *khálsás*, or lands held in demesne. Shortly after this, the minor Rájá, Churáman Rai, came of age; through extravagance and other causes he fell into arrears with his revenue, which led to an inquiry being set on foot and the attachment of the *parganá*. Eventually, in 1814 A.D., the estate was brought to auction, and purchased by Government. Just before this, in 1812 A.D., what is known as Mr Perry's Settlement had been concluded. I believe that Mr Perry gave the *jágírdárs* an acknowledgment of their title on behalf of Government; while from the *ijárádárs* he took simple *ikrárnamás*, or engagements to pay a stated rent. Two or three years later, in 1816 A.D., the Government bestowed the entire *parganá* upon Rájá Ghanesám Sinh of Deo in Gayá, as a reward for military services. The Rájá, acting as he believed within the terms of his *sanad*, commenced a system of interference with certain of the tenure-holders; and this and certain acts of oppression on the part of his servants having caused an insurrection, the Government resumed the grant.

"It appears from early correspondence, that Mr Mathew Leslie recognised certain tenure-holders styled *jágírdárs* as proprietors, whose long and unquestioned possession entitled them to hold on a fixed rent, and he treated them accordingly. All other lands he appears to have dealt with as being either under temporary settlement, and liable to interference and re-settlement by the Rájá, or as

lands held in demesne. Mr Perry appears to have somewhat disturbed Mr Leslie's Settlement. But I gather from the following extract from a letter to the Secretary to the Board of Revenue, which would appear to have been written about the time of the dispossession of Ghanesám Sinh of Deo, that the *sanad* granted to Ghanesám Sinh expressly limited the benefit of the interference of Government to a certain class of people called *jágírdárs*, who had been for a long time in possession of certain lands at a fixed *jamá*; and stipulated for all such individuals, a perpetual continuance of the said lands at the *jamá* fixed for them by Mr Leslie. 'With the exception of such lands as are described to be *jágírdárí* tenures in that settlement, the *sanad* leaves the Rájá (*i.e.*, Ghanesám Sinh) and his heirs at full liberty to make their own arrangement with the *farmers* of the *parganá*.' If this be a true extract from the *sanad* granted by the Government, it is not very difficult to arrive at a conclusion as to what the Government rights as a landlord are, or were. It must be borne in mind that Mr Leslie's Settlement bears the date 1790 A.D., at which time the last of the Mahárájás, Churáman Rai, though a minor at the time, was on the *gadi*. From my own experience, I believe that very few of the tenures called *ijárás* were then in existence. Most of them bear the signature of, or purport to have been granted by, Churáman Rai, and were most probably created by him in his later difficulties. Mr Perry appears to have treated these tenure-holders in a temporising manner, and eventually to have merely taken agreements from them for the payment of their rents; whereas the course undoubtedly open to him was to have dealt with simple *ijárás* as farms liable to settlement. Where, however, there had been a money premium, and the *ijárá* was in the form of a mortgage, he should have advised a foreclosure. There can also be no doubt that the Government, when making over its rights and privileges to Ghanesám Sinh, passed over Mr Perry's arrangements altogether, and took its stand upon the earlier Settlements of Mr Leslie. All these rights and privileges were resumed by Government, on its taking back the *parganá* from Ghanesám Sinh. I would therefore describe the rights and privileges of the Government as a landed proprietor in Palámau thus:—(1.) The Government cannot disturb the possession of those ancient *jágírdárs*, whose estates are enumerated, and whose *jamás* were fixed by Mr Leslie, so long as they continue to pay the revenue with regularity. (2.) The Government can, however, resume any of those *jágírs*, in case of failure of lineal male heirs

of the original grantee, according to ancient custom, whether such a condition is or is not specially mentioned in the *sanad*, as also in case of failure to pay the Government demand; and on resumption, may deal with the estate as one held in demesne. (3.) The Government, as superior landlord, can call upon its feudal tenants or *jágírdárs* above-mentioned of all denominations, to render such service as from ancient custom they are bound to render. This service includes the furnishing of men, ammunition of war, supplies, and money, as their quota towards the proper preservation of peace within the *parganá* and the protection of property; and of *madad* or assistance, each according to his means (*hasb-ul-liákát*), in making and keeping up roads and bridges within their several estates. In the exercise of the above rights, the Government, during the long course of years that has elapsed since it took up the direct management of the *parganá*, has frequently resumed *jágírs* on failure of male heirs. It has also on several occasions called upon the *jágírdárs* to render service, and to furnish ammunition and supplies.

"The foregoing only refers to the rights of the *zamíndár*, that is, the Government, in respect to the *jágírdárí* estates. Of the rights of Government in respect to those tenures called *ijárás*, I am not quite sure. It is clear that the Government never contemplated assigning them the rights and privileges of full proprietors, which were accorded to the *jagírdárs*. In my opinion, the Government possesses the right of stepping in at any moment, and making a re-settlement of all tenures, the *pattás* or leases of which bear date subsequent to 1790; but it could not disturb possession, unless there was a refusal to accept settlement, in which case the *ijáráddár* would probably be entitled to *málikáná*, or monthly allowance regularly made to dispossessed land-holders.

"In describing the rights of Government as superior landlord, I have incidentally enumerated those of the *jágírdárs*. I would merely add that their tenures cannot be sold for arrears of rent or revenue; that they are bound to pay the Government demand when due; and that on failure to do so, their *jágírs* became liable to resumption. This extreme measure would, however, appear to have been rarely taken, the usual course being attachment. The *jágírdárs* are prohibited from disposing of their estates by sale. As a matter of fact, they not only openly dispose of them in this manner, but their estates are also brought to the hammer under decree of Court; but in either case the sale is at the sole risk of the purchaser, who is not protected in case of the resumption of the parent estate.

"SUB-TENURES.—The next link in the chain is formed by those rent-paying sub-tenures which are immediately subordinate to the superior tenures, and intervene between them and the peasant holdings. First in order come those sub-tenures which, in name and nature, hold exactly the same relative position to the superior tenures that the superior tenures do to the Government, the *zámíndár*. The *jágírdárs* of the *parganá*, following the example set them by the Maháráják, in their turn gave portions of their estates in *jágír* on terms identical with their own. Each *jágírdár* had to provide the younger branches of the family with maintenance, so that each large *jágírdárí* estate represents, as it were, a facsimile of the head estate or *zamíndárí*. These *sub-jágírs* and other tenures of old date are all service grants, and liable to resumption by the superior tenure-holder on failure of heirs. It is only those estates created in later times, such as *mukarrarí* mortgages, &c., granted for a consideration, which are not liable to resumption by the superior *jágírdárs*. As in the case of superior tenures, the rents of the sub-tenures are merely nominal, the superior tenure-holder being content with what he could squeeze out of his *sub-jágírdárs* under cover of the term *madad*. This is, however, no longer the case, and the *madad* is not so easily obtained as in former days; the *sub-jágírdárs* having learnt that while the landlord can get a decree for his rent, the Court will not take cognizance of a claim for anything which is not rent. After these come the several classes of lease-holders, *zar-i-peshgidárs*, permanent and temporary leases, which in themselves require no special explanation. The only thing remarkable in the engagements under these leases, is the absence of all mention of peasant rights. The only tenures which these farming leases, as a rule, recognise at all are the rent-free tenures. There is a peculiar form of lease bearing no special name, though it might with propriety be called a *jangal-burí* lease. It consists in the separation from the rest of the village area of a certain tract of jungle land within certain specified boundaries, denominated a *khát*. The leases invariably direct the lessee to clear the jungle and bring the land under cultivation. Sometimes they provide for a quit-rent, and give the land to the lessee and his heirs to hold as long as the rent is regularly paid; in others, the lease is temporary and not hereditary; while in others, again, there is a right of enhancement clause. Many of these leaseholders have been in possession for several generations, and no longer consider their tenures as a portion of the parent village; and in some instances during the

Revenue Survey they were treated as distinct *mahals*. It is impossible to assign any specific rights to this class of tenure-holders, there being such a variety of practice in regard to them. Each would have to be judged on its own merits."

THE FOLLOWING CULTIVATING TENURES are found in Palámau :—(1) *Pariáddári*, (2) *utakár* or *bighówtá*, (3) *kanwá* or *ánná* system, (4) *bhóli*, and (5) *bárí*. "(1) The *pariá* system of holding is a creation of the aboriginal tribes, and has arisen out of unwritten custom. It consists in dividing off certain of the village cultivated lands into *pariás* or shares, the general number being 16. The gross rent of the village being then ascertained, the total is distributed equally among the *pariás*. The lands generally chosen to be the basis of the *pariá* are the rice lands; but where there are no such lands, what are called the *dih* lands, *i.e.*, the permanently cleared high lands immediately surrounding the village homestead, are chosen, or sometimes the *bárí* or homestead land; and even in some cases I have known the *mahuá* trees to form the basis of a *pariá*. Each holder of a *pariá* has the right to occupy as much up-land as he can afford to cultivate, without being called upon for any further payment of rent. But these cultivators, holding only a fraction of a *pariá* and paying of course only a fraction of rent, have also an equal right to cultivate as much up-land as they choose; so that in the same village may be seen one cultivator with a holding, say, of one *pariá* consisting of three *bighás* of rice land for which he pays a rent of Rs. 30, and cultivating as attached to his *pariá*, say, 50 *bighás* of up-land; while another cultivator holding, we will say, ten *káthás* or one-sixth of a *pariá*, for which he pays Rs. 5, will also be found cultivating 50 *bighás* of up-land without any further payment of rent. The only remedy the landlord has against this, is to limit the area of up-land that fractional holders of *pariás* can cultivate, and to assess any up-lands they may wish to hold in excess. This was rarely done in former days, but the landlords have now begun to act in self defence. In the Government farms under the *rayatwári* settlement, a standard *pariá* was set up, and the proportion of up-land which could be held with it was fixed. The area of a *pariá* was declared to be three *parganá bighás*, and might consist either of three *bighás* of the same quality of land, or it might be a mixed *pariá*; but of whatever quality it might consist, the up-land attached to it is the same, *i.e.*, a first-class *pariá* consisting of three *bighás* first-class rice-land would carry with it three *bighás* first-class up-land,

whereas one consisting of, say, one *bighá* of first-class and two of third-class land, the up-land to be attached to it would likewise consist of one *bighá* first-class and two of the third-class. (2) In the *utakár* or *bighá* system, rent is paid for each *bighá* of land held. No further explanation is necessary. (3) The *kanwádárí* system, strictly speaking, is the division of the entire village area into 16 *ánnás* or *kanwás*, each holder of a *kanwá* having a right to a sixteenth of the village area, including cultivation and waste. This is the theory, but in practice I have never found it to be so, except where the holders of the *kanwás* are not only *rayats*, but also shareholders; otherwise I have found that as a rule the *kanwá* division extends only to the lands actually under cultivation, the landlord, or farmer, or whoever he may be, assuming to himself the right to lease lands to *páikasht* or non-resident *rayats*, charging them rent for the same, and to settle new cultivators without any claim being set up by his copartners, the *kanwáddárs*. (4) *Bháolí system.*—This system prevails only in those *mahals* bordering on Behar, and in *parganás* Belaunjeh and Japlá. The system is peculiar, only in respect to the mode of assessment, and not to the distribution of land, which is the simple *bighá* system. Under the *bháolí* system the rent is payable in kind—that is to say, there is a division of crops. No *pattás* are given for lands held under this system. There are two methods of ascertaining the amount of grain or rent payable by the *rayats*—*dánábandí*, and *battayá*. Where the rent is assessed on the *dánábandí* system, an estimator or *shudkár* is sent to the land to value or estimate the crop when it ripens. The person chosen for this work is supposed to be a disinterested person, whose opinion may be relied upon. After the *shudkár* has delivered his estimate, the *dhanbháká* or village *panchávat* is appointed, partly by the landlord and partly by the *rayats*. The members of the *dhanbháká* visit the land accompanied by a *kátmárá* or measurer, or by the *patwárí* or some other village accountant or writer. They pass regularly from field to field measuring and estimating the crops, the *patwárí* recording opposite each *rayat's* name the amount or weight of grain estimated; half of this amount belongs to the landlord or person entitled to the rent, and half to the *rayats*. After the whole has been completed, each *rayat* is furnished with an abstract of the estimate, showing him exactly how much grain he has to deliver. This abstract is called an *utere*, and is the only proof the *rayat* possesses of his occupancy and his payment of rent. All

village titles, which by custom are payable by both parties, are deducted from the quantity estimated, before making the division. The amount entered in the *ulere* is unalterable, whatever the actual out-turn may eventually prove to be. Where there is no collusion, the estimates are generally pretty accurate; but very frequently the members of the *dhanbháká* have a private understanding with the cultivators, and sometimes they are the paid creatures of the landlord. Under the *dánábandí* system, after the estimates have been made and the *ulere* distributed, the landlord has nothing more to do. Each *rayat* brings his proper quantity of grain or its equivalent in money, according to market rates, as may be agreed upon. Under the *battayá* system there is no estimate of crops. The division takes place on the threshing-floor. Here the landlord has much more trouble than under the *dánábandí* system. From the moment the crop is ripe and fit to cut, to the time he proceeds to weigh it on the threshing-floor, he has to keep watch night and day to prevent being defrauded. Lands formerly held on the *bhádolí* system, when payment in kind has been commuted to a money rental, are said to be held *nakdí*. (5) *Bárí* lands are the homestead lands held by the peasantry, and consist of those immediately surrounding their dwellings or homesteads. The custom regarding these lands varies in different parts of the *parganá;* but as a general rule, all cultivating tenants in a village are permitted to hold a certain area of land as homestead, without payment of rent. The area thus assigned is generally about four to six *kathás*, *parganá* measurement. Where the area exceeds this, rent is charged, though sometimes *rayats* will be found holding *bárí* lands of two or three *bighás* in extent. Non-cultivators, or cultivators who are also artisans, requiring land on which to carry on their trade, such as weavers, *mahájans*, and shop-keepers, are not entitled to homestead land free of rent.

"In Palámau, cultivators are divided into two broadly-distinguished classes—(1) *khudkásht* or resident *rayats*, (2) *paikásht* or non-resident *rayats*. The rights of the first named are governed by unwritten custom descending for ages. The giving and taking of *pattás* and *kabuliyats* in Palámau is a custom of rare occurrence, and has been introduced from Behar. As a rule, the cultivators of a village rarely hold their lands on *pattás*. Receipts for rent too are rarely given, while suits for arrears of rent are rarer still. The fact that scarcely 297 suits for arrears of rent have been brought during the past eleven years speaks for itself. The *rayats* have not so much

rights of occupancy in any particular field, as the right to cultivate in the village at village rates. And this is a right which is never denied by the landlord. It may be that were cultivators more numerous in proportion to the area of available land, their position would not be so secure as it is now; but one thing is certain that, comparing the Palámau cultivator with those of his own status in the adjoining Districts of Gayá and Sháhábád, there cannot be a doubt that he is far better off in every way than his neighbours. It is very rare indeed that the Palámau landlord proceeds to oust [illegible] resident cultivators, or impose upon him an increased rate of rent, without a just reason for so doing; that is to say, if the produce has increased by better irrigation, brought about by the landlord having expended capital in making a reservoir or raising an embankment, and the increase is so marked that the cultivator has nothing to urge against the increased demand. It is true that the landlord frequently imposes *abwábs* of different kinds, some of them in a measure legalised by long-established custom; but he dare not go any great length in so doing, without running the risk of losing his tenants. Taken as a whole, the Palámau peasant is better housed, clothed, and fed than his Behar neighbour. He is very improvident and often in debt; but there is this difference between him and the *rayat* of Bengal, that whereas he is only the victim of the *mahájan*, the latter is the landlord's also. The Palámau landlords have never admitted a right of occupancy (as defined in Act X. of 1859) on the part of their *rayats*, but have always assumed to themselves the right to enhance at will at the end of the year; and it may be fairly argued that, with long-established usage as their guide, they have a perfect right to do so. The Law of Landlord and Tenant, it must be remembered, has never been extended to Lohárdagá District. The local Courts have been simply enjoined to act according to the spirit of the Act, that is to say, in regard to procedure when dealing with rent disputes, and to procedure only. There are hundreds of cases, it is true, in which *rayats* have been permitted to hold the same lands for generations. And yet, if dispossessed to-morrow, however hard they might think it, they would accept the situation without remonstrance; but such harsh measures are very rare, and, as a rule, Palámau tenants are treated very leniently by their landlords. The assessment is light, the terms on which they hold their land are easy, and as the population is scant and land is plentiful, the cultivating peasant is too valuable and too easily scared

away, or induced to settle on a neighbour's lands, to admit of his being rack-rented.

"RENT-FREE TENURES.—The rent-free tenures of Palámau may be broadly divided into two classes—those created by the Mahárájá, and those created by the *jágírdárs* and other superior tenure-holders within their estates. The following is a list of the several kinds of rent-free tenures as existing at the present day:—Religious grants—(1) *Kus khairát* (2) *Vishnu prit*, (3) *kus prit*, (4) *guru pujá kus prit*, (5) *Seo prit*, (6) *kus betalab chandra grahan*, (7) *kus betalab sankalp*, (8) *dán betalab sankalp*, (9) *kus surjyá grahan*, (10) *Vishnu prit masrat badán asírbád*, (11) *Seo prit masrát pujá Seo*, (12) *dakshiná barbans*, (13) *guru dakshná kus brit*, (14) *kus betalab*, (15) *Seo prit khairát*, (16) *Seo prit sankalp*, (17) *kus sankalp*, (18) *kus sankalp masrat*, (19) *khidmat Mahádeo*, and (20) *brit khairát*. Rent-free grant to commemorate recovery from leprosy—(21) *kusht sánt nimártik*. Grants made in reward of service—(22) *khairát inám*, (23) *jágír lakhiráj*, (24) *jágír inám*, (25) *inám*, (26) *jágír ba-shart khidmat thánádárí*, (27) *brit inám*, (28) *jágír inám betalab*, and (29) *jamá khárij madad másh*. Vow of relinquishment—(30) *Seo nirmayí*. *Kází jágír*—(31) *kus brit kází*. Reward for honourable wounds given in lieu of blood-money—(32) *khun báhá jágír*. Simple rent-free tenures—(33) *brit betalab*, (34) *khairát betalab*, (35) *brit*, and (36) *khairát*.

"Many of the tenures comprised in the above list contain revenue or rent-free estates of considerable extent. The most important is the service tenure No. 26 in the list, which comprises the estate known as the Nagar Natárí *mahal*, consisting of 301 villages. This estate seems to be as ancient as the original Palámau estate, and to have been separate and distinct from it. In fact, it would appear to have constituted at one time a separate *parganá*. The proprietors, who hold the title of *bhayá*, do not originally appear to have been vassals of the Chero Mahárájás. The estate was constituted a royal grant, long prior to the creation of *parganás* Japlá and Belaunjeh into a royal *altamghá* grant, and was granted to the *bhayás* as a *ghátwálí* tenure for the protection of the Behar boundary. The *bhayás* are a branch of the Sónpurá family of Belaunjeh, being the descendants of the elder wife of one of the Rájás. In the Sónpurá family it is a custom for the first-born son to succeed, whether born of the elder or the younger wife. The title of *bhayá* sprung from the fact that on one occasion the elder wife had a son

after the younger wife, and the question of title was settled by calling this son *bhayá* or brother. The *sanad* of the Natárí estate provides for the maintenance of the police; and up to the present date the cost of the entire imperial police force within the estate is maintained by the *bhayá*.

"Most of the rent-free tenures in Palámau are hereditary, either by express terms or from long-established custom. Some of the holders are possessed of *sanads*. But by far the greater number have merely little scraps of paper said to be *wáguzáshts*, or confirmations of original *sanads*, granted chiefly by Rájá Churáman Rái; and in nine out of ten cases the chances are that these so-called *sanads* are forgeries, set up chiefly at the time of the earlier Settlements.

"TENURES OF PARGANÁ BELAUNJEH.—*Parganá* Belaunjeh forms a long steep of hilly broken country, varying from ten to twelve miles in width, intervening between Palámau and the Són river, which runs due east and west along the whole of the northern boundary. The District of Mirzápur in the North-Western Provinces forms the extreme western, and the North Koel river the greater part of the eastern boundary. A small portion of the *parganá*, stretching across the Koel river, intervenes between Palámau to the south and *parganá* Japlá to the north. Belaunjeh, which is geographically divided into four minor fiscal divisions or *tappás*, namely, *tappás* Paraudá, Pahárí, Deymá, and Khayrá, forms an estate belonging to an ancient family of Rájputs. The present Rájá, Ridnáth Sáhi, claims to be the 56th in descent from Rájá Nar Náráyan, the alleged founder of the family. He does not, however, possess any records which date further back than the time of Rájá Kindra Sáhi, the 50th of the line, who lived about the year 1708 A.D. The family appears to have been the proprietor of *parganás* Japlá and Belaunjeh on the east bank of the Són, and also of *parganás* Hávili, Sarkár Rohtás, Subah Behar, on the west bank of that river. The Mughul Government styled the Rájás the *sole zamíndárs* of these three *parganás*; and in a paper, termed a *taslimamá*, dated 25th of the month of Zilhij of the year 7 Jalús, addressed to Rájá Balbhadra Sáhi, the immediate successor of Rájá Kindra Sáhi above mentioned, the *jamá* of the estate is declared to be Rs. 2459; but whether this is the *jamá* payable on account of the three *parganás*, or only for *parganá* Belaunjeh, is uncertain. The *taslimamá* was as follows:—'Writers of the present and future account of the history of *parganá* Sarkár Rohtás, belonging to *Subah* Behar, are informed that the Rájá Balbhadra Sáhi attended this

dargá, and petitioned as follows: 'That from a long time the *jamá* of the *táluk* already in his possession is settled at Rs. 2459; that at present the officers of the Khálsá, on account of his having no *sanad* of *zamíndári* of the aforesaid *dargá*, wish to increase the rent. In reply to his petition, it is hereby ordered that the *málguzárí* of his *táluk* shall not be allowed to be increased during his and his successor's times, and the officers must take Rs. 2459 only and nothing more, because he has to support his family from the income of that *tálukd*. He is also exempted from paying other expenses, such as *kánungo*, &c., &c., on account of his being a man of very high family. The aforesaid officers should be particular not to infringe this order.' It would appear from the above, that at this time the three *parganás*, forming the Rájá's *zamíndárí*, comprised a revenue-paying estate. For some act of disloyalty, as it would seem, the old Hindu Rájá was dispossessed, and the two *parganás* Belaunjeh and Japlá were afterwards created into an *altamghá* estate by one of the Mughul kings of Dehli, in favour of the ancestor of the present Nawábí family of the latter *parganá*. The Rájás fought every inch of the ground to keep their patrimony; and the Nawábs succeeded only in getting actual possession of Japlá, and of that portion of Belaunjeh mentioned below as lying on the east bank of the Koel. The Nawábs eventually relinquished their rights in Belaunjeh to the British Government; and the Settlement was made with the Rájás as *mukarraridárs*, the whole of the revenue assessed (Rs. 7883-12) being paid at the present day to the various representatives of the Nawábí family, under the name of *málikáná*, a term properly applicable to the allowance awarded to a dispossessed proprietor.

"The principal subordinate tenures in Belaunjeh consist of maintenance *jágírs*, service grants, *mukarraris* and other *istimrári* hereditary tenures, both rent paying and rent free, similar to those found in Palámau. The peasantry of the *parganá* hold their lands, as a rule, on the *bhaoli* system previously described. Both the *dánábandi* and the *battayá* modes of collecting the rent in kind are employed, but the two methods never prevail in the same village together. The *bhaoli* system extends, as a rule, only to the permanent holdings; outlying lands held temporarily, such as jungle *tánr* lands, are usually held on the *nakdi* or cash system. In a few villages only is the *nakdi* system found throughout. *Pattás* are, as a rule, given for lands the rent of which is collected in cash. In the case of newly broken-up jungle land held on the *bhaoli* system, the proportion of the produce exacted by the landlord is not, as a rule, one-half, as has been shown

to be the case in old lands. In such cases the landlord, in consideration of the labour and expense which the cultivator has to incur in order to bring the land into a proper state of cultivation, sometimes exacts no rent for the first two or three years; and after that the *rayat* has to give a fourth of the produce, and so on by gradual increments until he can fairly afford the usual quota of one-half. The same consideration is shown to new settlers, where the rent is paid in money. This custom prevails also in Palámau, where new settlers are treated with every consideration, both in regard to the terms on which they hold their land and the assistance given them in the shape of money, grain, and plough cattle.

"TENURES OF PARGANÁ JAPLÁ.—*Parganá* Japlá formerly belonged, with *parganá* Belaunjeh mentioned above, to the Rájás of Sónpurá. It was granted by Muhammad Sháh, king of Dehli, as a royal *altamgha* grant to Amtulzohra Begam, wife of Nawáb Hidáyat Álí Khán, in the hands of whose descendants it has remained ever since. On the death of the Begam, her eldest son, Ghulám Husáin Khán, author of the *Siyar-ul-mutakharín*, succeeded; and his second son, Takhyali Khán, *alias* Farakul Daulá, obtained a similar grant of *parganá* Belaunjeh. The Rájá did not submit quietly to this summary ejectment by royal *farmán*, and it was only after a long and protracted struggle that the Nawábs succeeded in securing peaceful possession of Japlá. The struggle for the possession of Belaunjeh was protracted for a much longer period, and finally terminated in the compromise which has been described in the account of the Land-Tenures of that *parganá* on the preceding page. The Nawábi family of Japlá is now almost extinct, more than three-fourths of the estate being held by aliens, the greater number of whom pay no rent. The lands are almost all held on the *dánábandi* and *battayá* forms of the *bhaoli* system, by which the rent is collected in kind. In fact, the system is exactly identical with that which prevails in the neighbouring *parganá* of Belaunjeh. As Japlá forms a Muhammadan estate, there are no extensive Hindu rent-free tenures, though there are many petty rent-free holdings granted by Rájput landlords. The chief rent-free tenures are those granted by the Nawábs, of which the following is a list:—(1) *Mussajid*, guardianship of mosques; (2) *mukábir*, guardianship of ceremonies; (3) *wakf*, or charitable bequests; and (4) *niáz-i-dargáh*, or grants to particular shrines. All these are obviously of Muhammadan origin."

RATES OF RENT: OPERATION OF ACT X.—Owing to the impossi-

bility of reducing the local land-measures, no general statement of rent-rates can be given for Chutiá Nágpur Proper. The ordinary rents paid in the Subdivision of Palámau have been shown, as far as was possible, in the paragraph on Classes of Land (*ante* pp. 337, 338). The provisions of Act X. of 1859 have never been formally extended to the District of Lohárdagá, but the spirit of the law is followed in the decision of rent cases. All over the District the landlords are now (1875) trying to enhance rents; but their attempts do not, as a rule, take the form of a direct money demand, and the customary rate of the village is often nominally retained, although the cultivators have, in fact, submitted to an increase. For instance, it has often been observed that near Ránchí, where the action of the landholders has been most vigorous in this respect, the average size of the *khárí* of low land is much smaller than in more remote parts of the District; while, in some extreme cases, *páwás* have been converted into *khárís*, and charged as such. Thus, the fiction of an unchanged rate of rent was preserved, although, in fact, the rents of the cultivators had been doubled or quadrupled by decreasing the land-measure.

Rotation of Crops.—On the rice lands of Chutiá Nágpur Proper the rotation of crops can hardly be said to be practised. An attempt, indeed, is made in this direction, by sowing different varieties of rice-plant in successive years; and even on the very lowest lands it is not uncommon to sow rice broadcast one year, and to put in a transplanted variety the next. But the latter method is not in favour with the best cultivators, and it is doubtful whether the varieties differ enough to affect the soil to an appreciable extent. On high lands, however, a regular system of rotation is worked out as follows:—1st year, *maruá*, for which the ground has previously been highly manured; 2d year, *gorá dhán*, or highland rice, which may be manured slightly, and which requires the land to be thoroughly ploughed at intervals throughout the year; 3d year, *urid*, which, like all pulses, is highly absorptive of manure, and takes out of the land most of the fertilising elements that had been left there by the preceding cereal crops; 4th year, *gondli*, or millet, which grows productively on a very poor soil. In the same year, after the millet is off the ground, the oilseed, *surgujiá*, may be sown. By the time this is cut, the soil has been rendered friable and ready for ploughing, and it is ploughed continually until the season comes round for manuring the land, and beginning the series again by sowing *maruá*. It will be observed that the principle of the foregoing system is to make

one application of manure yield four or five different crops, each of which leaves in the land the fertilising elements which are required by its successor. *Maruá*, for instance, requires a large quantity of manure, while highland rice is injuriously affected by the presence of weeds, and the process of clearing these out when the rice is on the ground is peculiarly troublesome and expensive. Rotation, therefore, begins with a crop of *maruá*, and the land is previously ploughed once a month throughout the year, so that it is free from weeds and ready for the *gorá dhán*. This will yield a good crop without much manure, and has the further advantage of leaving the land full of grass for the succeeding crops. Some cultivators plant the *urid* before the *gorá dhán*, and this is perhaps a more scientific method. But Mr T. F. Peppè, to whom I am indebted for the information incorporated in this paragraph, is of opinion that, under the conditions of soil to which they are applied, it would be difficult to improve upon either system of rotation. Occasionally *rahar dál*, or a pulse called *bodi*, is sown with the highland rice, and reaped in the spring.

Again, in the tract lying below the plateau to the east, and known as the Five Parganás, the following system is in vogue for the alluvial lands in the river valleys where sugarcane is grown:—1st year, sugarcane; 2d year, *gorá dhán;* or 1st year, sugarcane; 2d year, poppy; 3d year, *gorá dhán*. This form of rotation, however, is not designed to supply the place of manure, but is prompted simply by the fact that sugarcane occupies the ground for thirteen months, and therefore cannot be grown in the same field year by year. Until lately, a crop of tobacco was planted alternately with one of sugarcane, and in some places this plan is followed still. But the area of land under tobacco is decreasing rapidly, as that crop is everywhere giving way to opium.

In the Subdivision of Palámau the following system of rotation is adopted for *diháam*, or well-manured high lands, which lie close around the village:—1st year, *makai;* 2d year, *maruá;* 3d year, *sarsu*, *barai*, or *sáwán;* 4th year, gram, or wheat. For *tánr*, or land reclaimed from jungle, the series is:—1st year, *til*, or *kodo;* 2d year, cotton; 3d year, *urid*, after which the land lies fallow for two or three years, and the jungle springs up again.

Manure (*mánd*) composed of cattle-dung, ashes, and house-refuse, is used by all cultivators who can get it. Dung is chiefly used for the low lands, while in manuring high land a larger proportion of ashes

is applied. Rice is also indirectly manured to a certain extent, through the practice of leaving more than half the stalk standing when the crop is cut, to be subsequently eaten off by cattle. The cost of manure per standard *bighá* of land cannot be estimated, as manure is never sold in the open market. A considerable demand for manure is now beginning to arise, in consequence of its extensive use in tea cultivation.

Irrigation.—Three modes of irrigation are in general use:—the *kachchá* well, the *dárí*, and the *áhrá*. A *kachchá* well can be dug some eight or ten feet deep at a cost of from Rs. 5 to Rs. 10 (10s. to £1). It is reckoned that one such well can be made to irrigate five *bighás* of land. A *dárí* is simply a natural spring, the mouth of which has been enclosed in a rough framework of wood to preserve it from surface pollution. An *áhrá* is a small embankment thrown across the upper and narrower end of the trough-shaped depression that lies between two ridges of land. It thus forms a reservoir at a high level, from which all land lying below the *áhrá* may be irrigated as long as the water lasts.

Natural Calamities.—Mildew and a variety of blights caused by insects and worms occur occasionally in the District. No remedial measures are adopted against them, except in the case of *bánkí*, a small grasshopper which eats the seedlings of lowland rice after they are planted out. It is believed that the ravages of these insects can be prevented by planting branches of *sál* or *champá* trees mixed with certain fruits, at the mouths of the small watercourses from which the fields are irrigated. Sometimes, also, slips of *gondlí* are thrown into the water lying on the field, in order that the smell which they give out when rotten may drive away the grasshoppers.

Droughts occasionally occur in consequence of a failure in the local rainfall, but seldom affect any considerable area. Such partial failures are more common in Palámau than in Chutiá Nágpur Proper. The last great drought is stated to have been in 1843. The highest prices of food-grains reached on this occasion are returned by the Deputy-Commissioner as follow:—rice, 7 *sers* to the rupee, or 16s. per hundredweight; paddy, 14 *sers* to the rupee, or 8s. per hundredweight; Indian-corn, 13 *sers* to the rupee, or 8s. 7d. per hundredweight. No further information is available, but the distress is believed to have been serious.

Floods are rendered almost impossible, except for a very short time, and within the narrowest limits, by the physical conformation

the country, and the extremely rapid discharge of surface drainage. The crops of the lowest levels are sometimes injured to a small extent by very heavy falls of rain.

EMBANKMENTS.—Owing to the height and strength of the river banks, there are no large embankments in Lohárdagá District designed to protect the country from being flooded. Everywhere, however, both in Chutiá Nágpur Proper and in Palámau, small embankments (*bándhs* or *áhrás*) are made for the purpose of irrigation. In Palámau, these embankments are repaired annually between the months of February and May by men of the Nuniyá caste, and it has become a settled principle with the cultivators never to work on embankments themselves. The Nuniyás work by measurement, being paid at the rate of R. 1 (2s.) per 800 cubic feet of earth. They number only 2196 in the entire Subdivision, and are better off and more independent than any other class of the population.

FAMINES.—The great famine of 1866 did not seriously affect Lohárdagá District. In Chutiá Nágpur Proper the highest prices reached were—Best rice, $9\frac{11}{16}$ *sers* for the rupee, or 11s. 6d. per cwt.; coarse rice, $11\frac{7}{16}$ *sers* for the rupee, or 9s. 9d. per cwt.; and coarse, unhusked rice, $22\frac{13}{16}$ *sers* for the rupee, or 4s. 11d. per cwt. While in Palámau Subdivision the maximum prices of the year were—Best rice, $9\frac{12}{16}$ *sers* for the rupee, or 11s. 5d. per cwt.; coarse rice, $10\frac{10}{16}$ *sers* for the rupee, or 10s. 6d. per cwt.; and coarse, unhusked rice $13\frac{4}{16}$ *sers* for the rupee, or 5s. 3d. per cwt. There is no doubt that the people felt the pressure of scarcity to a certain extent; but nowhere, except in one or two places on the borders of Mánbhúm, was there any approach to actual scarcity. It would seem, however, that the indications of distress afforded by money prices cannot altogether be relied upon. This is probably due to the fact that many of the grains on which the poorer classes subsist, either do not come into the market at all, or are sold at a customary price which bears no relation to the plenty or scarcity of the article sold. Thus, in 1859–60 actual famine prevailed in Palámau, and relief operations were resorted to on a considerable scale, although both husked and unhusked rice were selling at a cheaper rate than in 1866–67, when no actual famine was felt. Indeed, the high prices which ruled in the latter year are stated to have been caused in great measure by the demand for food-grains for export to other Districts.

FAMINE WARNINGS.—In Chutiá Nágpur Proper, rice forms the

staple food both of the Aryan and the non-Aryan population. Three principal rice crops are grown—*gorá dhán* or highland rice, *lahuha* or autumn rice, and *jarhan* or the great winter crop of the year. The aggregate produce of the two former crops is estimated by the Deputy-Commissioner at less than one-fourth of the winter crop. The rice of the preceding year is brought for sale to the local markets during the months of September and October, after which time it can hardly be procured, as the balance that remains in the cultivators' hands is stored up by them in small quantities for use as seed. As to the precise point at which scarcity may be expected to merge into famine, the Deputy-Commissioner says that, owing to the size of the District and the absence of trustworthy agricultural statistics, this question is one of considerable difficulty. He is of opinion, however, that when coarse rice is selling at $8\frac{7}{8}$ *sers* for the rupee, or $8\frac{7}{8}$ lbs. per shilling, and the corresponding kind of paddy at $14\frac{1}{2}$ *sers* for the rupee, or $14\frac{1}{2}$ lbs. for a shilling, scarcity would have passed into famine. In Chutiá Nágpur Proper everything may be said to depend on the winter rice crop, and a total failure of this would not be adequately compensated by an enhanced out-turn from the highland and autumn crops. If the autumn rice were to fail, and the price of rice were to rise to 16 *sers* per rupee (6s. 10d. a cwt.) immediately after the winter crop was off the ground, there is reason to fear that in March or April the price would be 8 *sers* per rupee (13s. 8d. a cwt.) and relief operations would be necessary.

In the Subdivision of Palámau the population is almost equally divided into two distinct sections—the Aryans, who live for the most part upon rice; and the non-Aryans, who depend chiefly upon the autumn harvest, and with whom Indian-corn and the blossom of the *mahuá* tree may be said to be staple articles of food. Both classes are affected by famine, but in a very different degree. For instance, in the event of a total failure of the autumn and winter rice, the spring harvest of pulses and the *mahuá* crop, the non-Aryan section of the population would be far worse off than the Aryan. For the former are almost entirely dependent on the local out-turn of Palámau itself, while the latter draw large supplies of food from Chutiá Nágpur Proper and the District of Gayá. So long, therefore, as the stocks of food in these exporting Districts are ample, a total failure of the rice crop in Palámau would not expose the Aryan population to actual famine. If, however, the failure in the rice crop were to extend to the neighbouring Districts as well, both

ryan and non-Aryan would be in serious danger of famine. In this ase, the aborigines would have a certain advantage from their nowledge of, and power of subsisting on, many kinds of jungle-ots and herbs. The importance of these jungle products, as se-urities against the extremity of famine, was very evident during the mine of 1866 in Mánbhúm District. With regard to the warnings f famine, the Assistant-Commissioner of Palámau is of opinion that n indifferent Indian-corn crop and rice harvest in one year, followed y the failure of the *mahuá* crop in March, together with a scarcity rainfall in June and July, and general high prices prevailing in the rrounding Districts, would give rise to serious apprehensions, and ould be sufficient grounds for anticipating so early as August a reat scarcity, if not absolute famine. The symptoms of distress ould begin to make themselves felt about the middle of January hen prices might be expected to stand at the following rates:—oarse rice, Rs. 3-8 a *maund*, or 9s. 6d. per cwt.; coarse paddy (un-usked rice), R. 1-12 a *maund*, or 4s. 9d. per cwt.; Indian-corn, s. 2-12 a *maund*, or 7s. 5d. per cwt.; *mahuá*, Rs. 2-8 a *maund*, or s. 10d. per cwt. A good *mahuá* crop following in March would fford partial relief; but if this crop again failed, relief operations ould in all probability have to be continued until the end of July middle of August.

With regard to the means available for averting the extremity of mine by importation, there are no railways, navigable rivers, or anals in this District, but there are roads and a brisk traffic by eans of pack-bullocks. As long as the famine is only local nd does not extend at the same time to the surrounding Districts, e means of importation are sufficient. In the case, however, of a eneral failure of crops, both here and in the surrounding Districts, is part of the country would be in considerable danger of isolation, nless grain were imported by the Government.

Foreign and Absentee Landholders.—The Deputy-Commis-ner reports that no European or Muhammadan landholders are istered as proprietors on the rent-roll of the District. There are, gether, only two estates in Lohárdagá—the Chutiá Nágpur Estate, l the Government Estate of Palámau.

Roads.—The principal roads in the District, with their length and rage annual cost for the three years, 1867–68 to 1869–70, are re-ned as follow:—(1.) Road from Ránchí to Silli, 39 miles in length; rage annual cost for repairs £355. This road was formerly under

local management, but in 1872 it was made over to the charge the Public Works Department. (2.) Road from Ránchí to Bankhe the northern boundary of the District, 18 miles in length, und the management of the Public Works Department. Annual cost repairs not returned. The following minor fair-weather roads all under local management :—(3.) Road from Ránchí to Chandw 50 miles in length, average annual cost of repairs £125, 8s. (Road from Chandwá to Daltonganj, 60 miles, average cost £16 2s. (5.) Road from Ránchí to Bandgáon, 34 miles, average co £93, 6s. (6.) Road from Ránchí to Tilmi, 12 miles, average c £161, 14s. (7.) Road from Lohárdagá to Chatrá, 60 miles, avera cost £138, 8s. (8.) Road from Daltonganj to Behar, 36 mile average cost £76, 14s. (9.) Road from Daltonganj to Garwá, miles, average cost £46, 14s. (10.) Road from Garwá to Kha *nadí*, 10 miles, average cost £50. (11.) Road from Ránchí to Pit riá, 11 miles, average cost £14, 12s. Besides the above-mention lines of road, there were in 1870 two other roads within the Distri under construction, which were under the management and supe intendence of the Dehrí Irrigation Department. (12.) Road fro the Rájera and Panduá coal mines in Palámau to Budhuá *ghát* the Són, 40 miles in length; and (13.) Road from the confluence the Koel and Aurangá rivers about 16 miles above Daltonganj, goi southwards towards the *sál* forests for the purpose of carriage timber. The total length of roads in Lohárdagá District is returne by the Deputy-Commissioner at 330 miles, maintained at an averag annual cost for repairs of £1080, 18s.

Mines and Quarries.—There are no mines in Chutiá Nágpu Proper, although iron is found in many places in a nodular form Lime is obtained in small quantities in the shape known as *kanke* or *ghutin*; and *ghatí*, a calcareous tufa formed by water with lime solution, yields a very pure lime suitable for whitewashing. In th south-east of the District soapstone is quarried to a small extent, an turned on a rough lathe into plates which are exported to neighbo ing Districts. Gold is washed by the poorest classes from sands of the rivers in the south of the District, especially in valley of Sonápet bordering on Singbhúm. Copper has been fou in several places in Palámau, but the size of the lode is too sm to be worked with profit. Three varieties of iron ore also occur Palámau—*biji*, *báli*, and *dherhar*. *Bibí* is said to be really the be as it is the most ductile; but the natives prefer *báli*, as it is hard

and makes better ploughshares and agricultural implements. *Dherhar* is very brittle, and is not much used.

COAL.—The only important coal-bearing area in Lohárdagá District is situated to the north of Daltonganj, the administrative headquarters of Palámau Subdivision. The following account of this field is taken from the *Memoirs of the Geological Survey*:—

"THE DALTONGANJ FIELD lies partly in the valley of the Koel river and partly in that of the Amánat, extending altogether a distance of 50 miles from east to west. Its total area is nearly 200 square miles. This statement of its size, however, conveys a very erroneous idea of its value as a coal-bearing tract, for out of the 200 miles, scarcely 30 belong to the Dámodar series. The boundaries of the field are very irregular, and for distances of considerable length, they are often so obscured by alluvium that they have been plotted only approximately. The most eastern extremity is near the village of Loharsí, (which is just within the Palámau boundary after leaving Hazáribágh District). The most western extremity is *probably* near Chitorpur, a mile or so beyond the town of Garwá. Hitherto, it has been the custom to call this field the Palámau, and not the Daltonganj coal-field. There are, however, many coal-bearing areas within the Subdivision of Palámau, and the name consequently of the Palámau field as applied to any one of them is not sufficiently distinctive. The designation would be admissible did any coal-measures occur near the town of Palámau; but that town happens to be far distant from any locality in which coal-measures exist. To indicate, therefore, more precisely the geographical position of the field, a fresh name has been adopted from the Civil Station of Daltonganj, which lies just beyond the southern borders of the field. The surface of the country, within the limits of the field, is an undulating plain with no rising ground (consisting of sedimentary rocks), that has any pretensions to the name of hill. All the inliers of gneiss—and there are several—have been planed down; and although bordering the field there are hills of the same or nearly of the same lithological character, that rise to a height of over 200 and 300 feet, and even considerably more above the level of the Amánat, still the metamorphic rocks, where within the area of the field, have failed to express a definite physical contour distinct from that of the Tálcher type. The principal drainage channels are the Koel and its affluent the Amánat. The latter river enters the field at its eastern extremity about two miles west of Loharsí; and then flows steadily westwards

until it joins the Koel five miles north of Daltonganj. None of the sections that it exposes in its passage through the Tálchers and Dámodárs are important either geologically or economically; and the same remark applies to those of the Koel. The tributaries of the Amánat are small streams with the exception of the Jinjo which may be further noted as the only one of its important feeders that exhibits coal in its banks. The Koel, soon after its entrance into the field, runs between high alluvial banks for about two miles but when it enters into the area of the Barákhars its banks lose their conspicuous height. Its most important tributaries are the Durgáoti with its sub-tributaries, the Sudábah and the Dánro or Garwá river. The last-mentioned stream exposes no coal, but it displays the entire series of the Tálchers in the west of the field.

"In ascending order, the formations usually developed in the coal fields of Bengal are:—I. Tálcher; II. Dámodar—(1) Ráníganj, (2) carbonaceous shales, and (3) Barákhar; III. Pánchet—Upper and Lower. In the Daltonganj field, only the Tálchír series and the lowest group of the Dámodars occur. I shall proceed to treat of the economic value of the field.

"On account of the limited area occupied by the Barákars and the paucity of coal seams, the economic value of this field is small. There is, indeed, but one workable seam—that which occurs at Pandua and Rájhera; and in calculating the available yield of coal, I would leave out of consideration the seams at Singra and the one in the Sudábah river, as they would only be worked for supplying fuel should their proximity to a lime or brick-kiln give them the advantage of position over the Rájhera seam. For any demands from a distance that may be made upon the Daltonganj field, the Rájhera (or Pandua) seam only would be available; and as I question whether any local demand will ever arise, a computation of its yield will give the true index of the value of the field. The area covered by this seam may be estimated at three miles by one, and, assuming that there is 6 feet of coal, the yield would be 18,000,000 tons. But a considerable correction has to be made on account of waste, &c., in working. From the 18,000,000 tons of possible coal, I do not think a deduction of $\frac{6}{10}$ would be excessive, and we shall have remaining 11,600,000 tons of coal available. Although this amount is small, it is sufficient to supply for the next fifty years any centres of industry that might find it advantageous to draw their fuel from the Daltonganj field.

"In the office of the Geological Survey, the following analysis of the Pandua coal, which had been exposed for several years, was made by Mr Tween, viz.:—carbon, 64·4; volatile matter, 22·4; ash, 13·4. In the *Indian Gleanings in Science*, vol. iii. page 283, the following analyses are recorded:—(1) Slaty coal, S. G., 1·482; water expelled on sand bath, 9·1; carbon, 52·1; volatile matter, 37·4; ashes, 10·5; percentage of ash in coke, 16·8. (2) Coal without lustre, S. G., 1·419; water expelled in sand bath, 7·1; carbon, 54·1; volatile matter, 36·4; ashes, 9·5; percentage of ash in coke, 14·9. Considering that the coal assayed by Mr Tween had been exposed for several years, and possibly some of the volatile matter had been dissipated, there is a close approximation to the results obtained and recorded in the *Gleanings in Science*. I have little doubt that these assays are of the Singra coal, and if so, it shows that the coal of the field is of pretty equable quality. Ten to thirteen per cent. of ash is in excess of the better kinds of Dámodar coal, but for ordinary purposes, this amount of inorganic matter is no serious drawback. The coal of this field is capable of performing the duties which Ránígani coal has hitherto accomplished. The Bengal Coal Company once worked the coal at Rájhera and at Pandua. Several shafts have been sunk, and two of them are of large dimensions. The finest is one south of the village of Pandua, which is 13 feet in diameter. The water in it stood at a level of 50 feet below the surface of the ground, on the 18th February 1869. Since 1862, operations have been suspended; but now that the project of the Són Canal has been sanctioned, a demand for coal may arise to bring into activity a branch of industry which so materially affects the welfare of a people. A road has lately been constructed to facilitate the carriage of coal from Rájhera and Pandua. It runs in a north-westerly direction, skirting the hills which border the Koel. It diverges from the Koel near Muhammadganj, and passing by Haidarnagar and Japlá touches the Són near Búdwá. The following returns of the coal raised between the years 1859 and 1862 are taken from the *Coal Resources and Productions of India*:—In 1859, 28,648 *maunds* or 1048 tons; 1860, 30,900 *maunds* or 1131 tons; 1861, 33,343 *maunds* or 1220 tons; and in 1862, 43,772 *maunds* or 1602 tons."

"MANUFACTURES.—Lohárdagá District is conspicuous for its poverty in manufactures of importance. Inferior articles of brass and iron work, coarse cloth, rough blankets, mats, baskets, rope,

and rude pottery-utensils, are the only manufactured products of the District. Until about ten years ago, all brass utensils were made by the process of moulding, as the braziers had not learned how to beat the metal into the required shape; and even now the local demand for brass utensils is met, to a great extent, by importation from other Districts. The pottery ware is thick, inelegant in shape, and wanting in durability. It is generally glazed with a mixture of *sáji mattí* or fuller's earth, catechu and *kábish*, a sort of red ochre. A strong cotton cloth called *dosúti* is woven in the District; but the supply of it has not at present been brought up to the demand. Most of this cloth is made by the Joláhás or Muhammadan weaving class; and many women of all castes live entirely by spinning cotton, for which they are paid by the dealers at the rate of half an *ánná* (¾d.), for every *ser* of raw material worked up into cloth. Useful mats, which white ants will not eat, are made by the Uráon women from the leaf of the palm-tree (*tár*), which grows abundantly in many parts of the District. These sell at one *ánná* (1½d.), for a strip six feet long by three broad. Hemp and aloe fibres are worked up into rope, but the rope is roughly made, and there is no great demand for it.

The Deputy-Commissioner reports, that the manufacturing classes are poor and illiterate. For the most part they carry on their work in their own houses, and the wages of the large majority range from an *ánná* and a half to four *ánnás* (2¼d. to 6d.) a day. Even the brass workers, who are far better off than any other persons engaged in manufactures, do not earn more than eight *ánnás* (1s.) a day.

Lac Manufacture.—Lac (*láh*) is a cellular resinous incrustation of a deep orange colour, secreted by an insect (Coccus lacca), round the branches of various trees, of which the *kúsúm* (Schleichera trijuga), *palás* (Butea frondosa), *pipal* (Ficus religiosa), and *baer* (Zizyphus jujuba) are the chief. Its principal chemical component is resin, which forms from sixty to seventy per cent.; together with ten per cent. of a dark-red colouring matter which occupies each of the small cells of the incrustation, and is itself a portion of the body of the female insect. From the resin is manufactured the shell-lac, and from the colouring matter the lac-dye of commerce. The entire secretion, while still adhering to the twig, is called stick-lac. In order to obtain the largest quantity of both resin and colouring matter, the stick-lac should be gathered before the young come out. This occurs twice a year, in

January and July; and the larvæ, as they emerge from the cells, carry away with them the greater part of the colouring matter. Stick-lac gathered after the insect has emerged, is known in Lohárdagá District by the name of *phunki*. It yields scarcely any dye, but is very good for working into shell-lac. If the manufacture of lac-dye were discontinued, *phunki* would come largely into use, and the seasons for gathering would in that case begin immediately after the insect had swarmed. The present seasons for collecting lac in Lohárdagá are from the middle of October to January, and from the middle of May to July. Thick jungles are the favourite haunts of the lac-insect; and it is found in large numbers in the forest-clad tracts of the Chutiá Nágpur Division, and in the eastern Districts of the Central Provinces. Ránchí, therefore, is a convenient centre, both for the collection of stick-lac and the manufacture of the commercial products known as shell-lac and lac-dye; a factory has for some years been in working, close to the cantonment of Dorandá, under the name of the Ránchí Lac Company. Large supplies of stick-lac are drawn from the District of Lohárdagá, and from Ráipur and Sambalpur in the Central Provinces, at prices paid ranging, according to the proportion of refuse, from Rs. 10 to Rs. 20 per *maund* (£1, 7s. 4d. to £2, 14s. 8d. a cwt.) for lac gathered from the *kúsúm*, and Rs. 10 to Rs. 15 per *maund* (£1, 7s. 4d. to £2, 1s. a cwt.) for that gathered from the *palás*. Stick-lac from the *kúsúm* yields a shell-lac of a light yellow colour, which has the highest commercial value; while the raw material derived from the *palás* yields a deeper dye, but a less valuable shell-lac than the former.

In manufacture, the first part of the process is to separate the lac from the twigs to which it adheres. This is done in the Ránchí factory by grinding the stick-lac in *chakrís* or mills, each of which is turned by two women. The lac is thus broken off the twig, and afterwards completely separated from the wood by winnowing and hand-picking. By further grinding, and sifting in a series of sieves, the lac is reduced to small dark orange-coloured nodules, known as *rangdár chaurí* or seed-lac, with the dye in it. This is mixed with a small quantity of water and put into good sized earthenware tubs, where the dye is trodden out by Uráon women. The process of extracting the dye is somewhat peculiar. A woman stands in each tub on the wet seed-lac, and steadying herself against the wall with her hands turns her body violently to the right and left so as to

keep the seed-lac in a continual state of friction against her feet and the sides of the tub. At intervals the tub is filled with water, on which the seed-lac sinks to the bottom, while the dye rises to the surface and is skimmed off in shallow pans. This process is repeated at intervals, until the water poured into the tub shows no trace of colour, owing to the lac-dye having been completely extracted. A full day's work in scouring out the dye is estimated at a *maund* and a quarter (102 lbs.) of seed-lac, from which the dye has been extracted. For this an *ánná* and a half (2½d.) is paid. The dye, which is taken up in the form of coloured water from the scouring-tubs, is strained through coarse cloth on a gently sloping platform with a raised edge. Fragments of seed-lac, wood, and dirt, that may have been taken up with the water out of the tubs, remain in the straining-cloths, and this refuse is subsequently dried and sifted and sold as *pánk*, for Rs. 3 per *maund* (8s. 2d. a cwt.). The pure colouring matter, still held in solution by the water, runs slowly off the platform through a fine wire sieve, and flows in a slow current along a gradually descending series of zigzag troughs into a well, the mouth of which is covered with a second sieve of still finer texture. While passing along these channels, the sediment that has found its way through the straining cloths falls to the bottom of the troughs, and a further deposit of sediment is left in the well. From the well, the coloured water is pumped up into a large vat, and at the end of the day lime-water is poured in to precipitate the dye. By the next morning the dye has settled, and is ready to be run out into boxes lined with cotton cloth, with small holes in their sides. From these the dye is transferred to compressible frames containing strong iron plates, and reduced by a screw press to solid sheets of dark purple-dye about a quarter of an inch thick. These are cut up into cakes, and stored until dry enough for packing.

The price of lac-dye varies very much, according to the demand in Europe. It is impossible to lay down even an average price for the commodity, but I may observe that for all articles in which permanent colour is not required, lac-dye can never compete with the cheaper and less permanent aniline dyes; while for more lasting colours, cochineal is preferred. Lac-dye, however, is superior even to cochineal in resisting the action of human perspiration; and it is probable that in the event of the supply of the latter falling short, lac-dye might be used in its stead to produce the scarlet of soldiers' coats.

The manufacture of shell-lac is an entirely distinct process. I have mentioned above that after the colouring water containing lac-dye in solution has been taken out of the scouring-tubs, the seed-lac from which the dye has been extracted remains at the bottom of the tub. This seed-lac, now of a golden-brown colour, is taken to a storeroom, dried, and sifted so as to separate the very small particles known as *malammá*, which would ignite during the process of manufacture into shell-lac. *Malammá* is afterwards sold ta Rs. 10 per *maund* (£1, 7s. 4d. a cwt.) to the local *láheris* or lac-workers, who make it up into bracelets and ornaments of various kinds. Seed-lac, then, which is to be made into shell, is poured into long bags about two inches in diameter made of American drill, and taken to the shell-lac manufacturing house, a long shed full of small *chulás* or fireplaces for burning charcoal. A brass cylinder filled with sand or some heat-absorbing substance, inclined at a slight angle to the ground, is placed within easy reach of each fireplace. A bag full of shell-lac is fixed horizontally on rough trestles before the fire, while a man and a woman sitting one on each side of the fireplace twist it tight and keep it turning briskly, until the substance of the lac melts and oozes through the interstices of the drill, into a shallow trough of aloe leaves placed under the bag. As the mingled resin and wax drop into the trough, the man, while still turning the bag with his left hand, stirs the melted substance in the trough with a wooden ladle which he holds in his right hand, so as to thoroughly amalgamate the wax and resin. He then lifts a ladleful of this simmering paste on to the cylinder, and spreads it lightly over the upper end. A second woman stands ready here holding in both hands a strip of aloe leaf, with which she draws down the melted lac in a thin coating over the surface of the brass. Directly this is done, the man cuts off the upper and lower portions of the sheet with a pair of scissors, and returns these ends, which are too thick for commercial purposes, into the trough of melted lac, where they are worked up again in the next sheet. The woman then takes up the sheet in both hands, stretches it while still supple with the heat in front of the fire, and lays it down as finished. The object of the stretching is partly to reduce the thickness of the sheet, and partly to pull out the small wave-like furrows which are impressed on it by the fibrous surface of the aloe leaf. While doing this, it is not uncommon to see the Uráon women, who are very intelligent workers, lift the hot sheet to their mouths and bite out any foreign substance,

such as dirt or sand, that may appear in the semi-transparent yellow surface. The staff of workers is the same at every fireplace, viz., a man and two women. The average rate of wages is an *ánná* and a quarter (1⅞d.) per day.

The hard, brittle sheets, now known as shell-lac, are taken, after they have cooled, from the manufacturing house to the storeroom, where they are broken into small pieces and packed after careful sorting for transport to Calcutta. The refuse left in the bags is taken out at intervals during the process of manufacture, and moulded by the hand into rough cakes called *kírís*, which are sold for local use at Rs. 4 per *maund* (10s. 10d. a cwt.). A special variety of shell-lac, very pure in quality, but rather darker than the favourite shell-lac of commerce, has usually been produced by the Ránchí Lac Company. This is known to the market as H.S.L.; and the Company are now (1876) engaged on a contract to supply it at the rate of Rs. 48 per *maund* (£6, 11s. a cwt.). The average yearly out-turn of shell-lac from the Ránchí factory is estimated at 8000 *maunds* or 292 tons, representing 16,000 *maunds* of raw material of the best quality, which contains $\frac{15}{16}$ of workable lac and $\frac{3}{16}$ of refuse.

Income of the District.—The Deputy-Commissioner in 1870 returned the estimated total of incomes above £50 in Lohárdagá District, as calculated for the purposes of the Income-tax Act of 1870, at £248,064. The net amount of tax (at the rate of 3½ per cent.) actually realised in Lohárdagá in 1870–71 amounted to £7855, 8s. In the following year, 1871–72, the rate of the tax was reduced to $1\frac{1}{4}$ per cent., and the minimum of incomes liable to assessment raised to £75 per annum. The net amount of Income-tax realised in that year was £1991, 12s.

Commerce.—The principal seats of trade in Lohárdagá District are Ránchí, Lohárdagá, Pálkot, Govíndpur, Garwá, Nagar, Untárí, Satbarwá, and Mahárájganj. By far the most important of these is Garwá in Palámau, which forms the distributing trade-centre for the surplus produce of great part of Sargújá, of the Tributary States further west, and of Palámau Subdivision itself. The Garwá market is held during the dry season on the sands of a river, and is perhaps the largest in the Chutiá Nágpur Division. Stick-lac, resin, catechu, cocoons of *tasar* silk, hides, oilseeds, *ghí*, cotton, and iron, are there collected for exportation. Rice and other food-grains, brass vessels, piece goods, blankets, broadcloth, silk, salt, tobacco, spices, drugs, and beads are brought to market for local consumption.

and to supply the stocks of itinerant merchants, who take these articles into Sargújá and Koreá. All over the District, trade is carried on by periodical markets, held once or twice a week, according to the importance of the neighbourhood which they supply. But by far the largest amount of business, at any rate in Palámau, is transacted in what Mr Forbes calls the "door-to-door trade," by travelling merchants who buy up produce from the cultivators. Owing to the general insolvency of the producing classes of Palámau, this trade is to a great extent carried on by means of advances, and the prices paid are consequently very low.

CAPITAL AND INTEREST.—The old landed proprietors of Lohárdagá District are not, as a rule, possessed of large savings, and they do not enter into money transactions in the character of lenders. Such transactions are carried on by *mahájans* or professional bankers and merchants, a few of whom are landholders as well as capitalists. These loans are of two kinds—those in which land is given as a security without possession, interest being charged at the rate of twelve per cent. per annum; and those where the transaction takes the form of a mortgage with possession, and the interest is at the nominal rate of one-half or one per cent. As, however, the mortgagee has complete possession of the property, the interest which he actually realises from his capital, is often very high indeed. In *zar-i-peshgi* loans, given in consideration of a lease granted by the borrower, the current rate of interest is twenty-four per cent. payable from the rents of the estate, and the amount of the advance is adjusted in proportion to the rent-roll. Sometimes the precise rate of interest is not specified, but the lender is allowed to realise whatever he can get from the collections of the estate.

The more important forms of small transactions in cash or grain between cultivators and their landlords or their *mahájans* are the following:—(1) *Len-den* or petty loans to *rayats*, which are generally given in cash in the month of June when prices are at their highest, and repaid in grain after the winter harvest when prices are very low. Interest is charged at the rate of one-third of an *ánná* for each rupee per *mensem*, or twenty-five per cent. per annum, and is also paid in kind. So that for every rupee advanced in June, a *rayat* has to pay in December a rupee's worth of grain at the price then ruling, in addition to the worth of from two to three *ánnás* on the rupee as interest. (2) *Chárá* is a simple form of loan which resembles the foregoing, except that the interest is not estimated in

terms of money. The principal is paid in December, with one *maund* of grain at the market rate of the day, as interest. (3) *Khepi* is a form of loan made to persons taking a journey (*khep*) to purchase grain. Interest is paid at the rate of one *ánná* per rupee for every journey that is made. Thus, if a man borrows Rs. 25 as *khepi*, makes two trips for grain and repays the principal at the end of a month, he will have to pay fifty *ánnás* or Rs. 3, 2, 0, being interest at the rate of 150 per cent. per annum. (4) *Serí* is a form of loan peculiar to the south-western portions of Palámau and the western *parganás* of Chutiá Nágpur Proper. In the month of June the landholder advances to each of his tenants a *ser* of salt, which is repaid in December by one *maund* of grain. Sometimes tobacco is given instead of salt, and is paid for in the same manner and at the same time. The custom of giving *serí* loans is fast dying out, and is now chiefly interesting as illustrating the mode in which Hindu landlords used to deal with their aboriginal tenants.

In small transactions where ornaments or household vessels are pawned as security for the loan, the rate of interest varies from 25 to 37½ per cent. per annum, or from ⅓ to ½ an *ánná* for each rupee per mensem. Such loans are never given for more than half the intrinsic value of the article pawned; and if the money is not paid on the date specified, the property is, *ipso facto*, forfeited to the lender.

To illustrate more fully the system pursued by the *sáhus* or village grain-merchants of Palámau, and the entanglement of debt in which the *rayats* are involved, the following paragraph is quoted from Mr Forbes's Report:—"Before every harvest, the people apply to the money-lenders for loans to carry them on till harvest time comes. The interest demanded ranges from 8 *ánnás* to 3 rupees on each rupee per annum. Sometimes payment in kind at certain rates is stipulated for; sometimes the conditions are, that half is to be repaid in kind and the other half in cash. For instance, a Kharwár *rayat* wishes to prepare his *dáhá* or cotton lands; he visits his *sáhu* and requests a loan. After the usual difficulties as to scarcity of money, always raised by people of his class, the money is produced by the *sáhu*, on the verbal condition that it is to be repaid by delivery at harvest time of a certain amount of cotton at 16¼ *sers*, and sometimes 27 *sers*, per rupee—the market value being from Rs. 3, 8, 0 to Rs. 4. Punctually as the harvest comes round, the *sáhu* or his agent appears with his pack-bullocks to carry

off the cotton. If the quantity agreed upon is forthcoming, all is well; but woe betide the unfortunate cultivator if it is not. Should a small portion only be forthcoming, it is seized, and sometimes charged against the debtor as loss upon the profit which the *sáhu* would otherwise have made. The loan remains over till next harvest on the same conditions, only that interest is added. Sometimes the deficiency in the weight of cotton is made up by seizing other grain, proportionate to the market value of the cotton. Thus, supposing a loan of Rs. 4 has been taken on condition of delivery of 27 *sers* of cotton per rupee, the quantity to be delivered would be 2 *maunds* 28 *sers*, the market value of which at $6\frac{3}{4}$ *sers* per rupee, which is the cheapest rate, would be Rs. 16. If only 27 *sers*, value Rs. 4, and representing R.1 of loan be delivered, the *sáhu* will help himself, not to Rs. 3 worth of other grain, but to Rs. 12 worth. In the case of *til* at Rs. 2, 3, 6 per *maund*, this would be 5 *maunds* 16 *sers*; and if only 2 *maunds* 28 *sers* of *til*, value Rs. 6, were forthcoming, the balance of Rs. 6 is put down as the principal, and the same transaction is repeated the following year."

MISSIONS: HISTORY FROM 1844 TO 1868–69.—The original Chutiá Nágpur Mission was founded in 1844 by Pastor John Evangelist Gossner of Berlin, a Bavarian by birth and an energetic promoter of Missions in all parts of the world. In December of that year he sent out to Calcutta four Missionaries, named E. Schatz, F. Batsch, A. Brandt, and H. Sanke, but did not indicate any special field for their work. At first, they had some thoughts of proceeding to Thibet, a country to which attention had been directed by the recently published travels of the Abbè Huc. But while waiting in Calcutta, they came across some Kols who were working there as coolies, and being struck with their docility and good humour, determined to establish a Mission in Chutiá Nágpur. They reached Ránchí in March 1845, and worked there for five years without making a single convert. In the early part of 1850 "four men of the Uráon tribe came to the Mission-house at Ránchí and desired to see the Missionary. They said that they had read in a book of some one called Jesus. The word had pleased them, and they wished now to see Jesus." The book referred to seems to have been a Hindí version of the New Testament. They were invited to attend the evening prayer-meeting which the Missionaries held with a few orphans who were under their charge; but after the service they repeated their original request, and went away in anger when

the Missionaries explained that it could not be granted. After some days, however, they returned and asked permission to attend the English service, which satisfied them that the Europeans really worshipped an unseen God. Eventually, they were baptized and received into the Lutheran Evangelical Church. From these beginnings the number of converts rapidly increased. In 1855 a church was built; and Hindí was definitely adopted as the language of the public services, in consequence of the various dialects and defective vocabularies of the aboriginal tongues. During the Mutiny the native Christian community was broken up, but their dispersion over the District seems to have given a considerable impulse to Christianity, as the number of converts largely increased after the restoration of order. Thus, up to 1860, 1227 persons had been baptized; while in November 1868, the total number is returned at 11,108.

Ten years earlier, in 1858, Pastor Gossner, then 85 years of age, had proposed that the English Church Missionary Society should take over the charge of the Chutiá Nágpur Mission. The suggestion was favourably received by the Society in England, but was disapproved of by their Calcutta Committee and by the Ránchí Missionaries themselves. Accordingly, just before Gossner's death in 1858, a Society had been formed, called "the Evangelical Mission Society of Berlin, founded by Pastor Gossner," with a *curatorium* or Executive Committee to support and manage the founder's various Missions. In 1868, the Berlin *curatorium* resolved to change the entire constitution of the Chutiá Nágpur Mission, and sent their Secretary, the Rev. H. Ansorge, to Ránchí to carry out this change, and at the same time to inquire into certain charges made against the elder Missionaries by the younger men who had recently joined the Mission. On Mr Ansorge's arrival, the elder Missionaries declined to enter upon the question of the new organisation, until the complaints against them had been thoroughly inquired into. This was done at a general Mission Conference, at which two members of the Calcutta Auxiliary Committee of the Mission were present; and the charges were pronounced to be groundless. Mr Ansorge, however, refused to do anything to vindicate the elder Missionaries, and called upon them to at once receive the new constitution. This they declined to do, partly on the ground that they were still under the slur of mismanagement, and partly because the constitution was so framed as practically to deprive them of all share in the govern-

ment of the Mission. Accordingly, on the 22d November 1868, Mr sorge, who was entrusted with full powers by the *curatorium*, ed the elder Missionaries that their connection with the Berlin was dissolved. They, therefore, withdrew from the Church and the Mission building, and appealed to the Berlin Committee against Mr Ansorge's decision. In this course of action they were supported by all the residents of the Station, who addressed an appeal on their behalf to the *curatorium* at Berlin; while about five or six thousand native Christians declined to leave their former teachers, and presented a petition to the late Bishop of Calcutta, praying him to receive them with their pastors into the Church of England. Bishop Milman refused even to visit the Mission, until a definite answer to the remonstrance had been received from the Berlin Committee. When, however, he learned that the *curatorium* had decided to treat the elder Missionaries as seceders from the heran Communion, he included Ránchí in his Visitation Tour; on the 17th of March 1869, after an interview with the younger naries and most careful consideration of the entire question, ived the Kol Christians into the English Church. Returning on the 19th of April, he ordained F. Batsch, H. Batsch, and n, first as deacons and then as priests of the English Church. At the same time William Luther, a native convert, was ordained as deacon. This branch of the Chutiá Nágpur Mission was then placed in connection with the Society for the Propagation of the Gospel, although in the matter of funds that Society became only partially responsible.

From that time until now the English Church Mission and the an Lutheran Evangelical Mission have continued working side . "Such a division," says the report of the English Mission 9-70, "necessarily involved, especially at first, much that is egretted, but already we see with thankfulness that very much is resulting from what some imagined to be an unmixed evil." following paragraphs, which are condensed from the most reports, I have endeavoured to trace, first, the separate development of the two Missions, and secondly, the various causes which affect the progress of Christianity in Chutiá Nágpur generally.

CHURCH OF ENGLAND MISSION.—For the first year (1869-70) in which the Church of England Mission was at work, no accurate returns of the number of baptized converts are available. In 1870-71, including the out-stations of Hazáribágh and Cháibásá,

there were 5773 baptized converts inhabiting 330 villages, and under the charge of 5 ordained clergymen, 3 lay missionaries, and readers and teachers. Of the 330 villages, 318 were situate Chutiá Nágpur Proper, 8 in Singbhúm, and 4 in Hazáribágh. these, 924 unbaptized persons were under instruction at the close o the year. By 1873-74 the number of baptized converts had risen to 6663, under the charge of 9 Missionaries, the number of unbaptized persons receiving instruction being 1388. The sum of Rs. 782-11-7 (£78, 5s. 5½d.) was collected during the year from the native members of the Church. The returns for this year do not state the number of villages over which the converts were distributed, or the number of readers and teachers employed. The number of baptized persons given above is corrected from the returns of 1872-73, in accordance with a note in the report of the following year. In 1874-75, the numbers of this mission increased considerably. There were 8156 baptized converts, inhabiting 340 villages, of wh 320 belonged to Chutiá Nágpur Proper, 18 to Singbhúm, and Hazáribágh. During the year, 1535 persons were baptized 1289 unbaptized persons received religious instruction to p them for baptism. The collections from the native Chri amounted to Rs. 1283-2-11 (£128, 6s. 4½d.).

The following tables show in detail the statistics of the Mission for 1874-75.

STATISTICS OF THE CHUTIÁ NÁGPUR ANGLICAN MISSION FOR 1874-75.

NAME OF DISTRICT.	Number of Villages in which there are Christians.	Baptized.				Communicants.	In School.		Baptized during the year.	Catechumens.	Money collected this year.		
		Men.	Women.	Children.	Total number of Baptized.		Boys.	Girls.			Rs.	a	
Ráuchi.....	6	137	137	555	829	267	162	55	139	2	512	0	
Maranghada	78	316	328	642	1286	491	20	6	309	288	108	11	
Itki.....	60	223	267	441	931	386	81	21	164	200	84	8	1
Kuchábári...	47	198	205	336	739	324	26	28	47	140	51	4	3
Taplcárá.....	38	386	406	695	1487	602	119	36	292	175	159	7	0
Rámtoliá....	17	214	216	317	747	349	40	3	107	122	149	4	0
Murhu	74	448	497	675	1620	682	55	24	403	320	135	2	6
Hazáribágh.	2	55	56	85	196	107	16	4	14	17	7	8	0
Chaibásá.....	18	66	82	171	321	116	85	32	60	25	74	6	10½
	340	2045	2194	3917	8156	3324	604	209	1535	1289	1283	2	11

Balance Sheet of the Chutiá Nágpur Anglican Mission for 1874-75.

Receipts.	Rs.	a.	p.
Balance in hand on April 1st, 1874	1,693	12	10
Calcutta Diocesan Committee, S.P.G.	17,500	0	0
Offertories received through C.D.C.... 2607 14 10			
Ditto at Ránchí 2106 7 8			
	4,714	6	6
Subscriptions, &c., through C.D.C.... 186 0 0			
Ditto received at Ránchí 5421 3 11			
	5,607	3	11
Government Grants for English Service	1,008	11	6
Ditto Schools and Orphans	2,404	8	0
Calcutta Native Pastorate Fund, for Rev. W. Luther	90	0	0
Ránchí Native Congregation for ditto	82	8	0
School Fees...	149	12	0
Hazáribágh Tea Estate for a Teacher	60	0	0
Work done by the Press	55	8	0
Subscriptions to Quarterly paper	7	8	0
Rev. E. C. Glyn, Beverley, for Readers...	189	14	2
Deficit on March 31st, 1875	109	15	1
Total Rs.	33,674	12	0

Expenditure.	Rs.	a.	p.
Salaries of Missionaries	12,187	12	0
Ditto Readers	2,260	0	0
Ditto School Teachers	2,736	0	0
Boarding-School expenses	5,378	3	6
Travelling ,, ...	886	5	9
Deré, i.e., Lodging-House for Villagers...	263	12	3
House and Ground-rent	422	4	0
Repairs	358	9	6
Taxes	39	0	0
Native Doctor and Medicines	303	3	3
Servants	78	0	0
Towards building and enlarging Village Chapel and Rest-houses	1,203	2	0
Printing Press	326	6	6
Paper for Books...	101	0	0
Printing Report and Quarterly papers and postage	299	2	0
Passages from Europe and Furlough Allowances...	3,700	0	0
Contingencies	65	6	9
Cháibásá Mission Expenses	2,790	4	6
Hazáribágh ditto	276	4	0
Total Rs.	33,674	12	0

I have mentioned above that the church and mission buildings, which belonged to the original Gossner Mission, remained in the possession of the Lutheran Missionaries, when the elder members of that communion were received into the English Church. At first, therefore, the English Mission services were held in a large shed-like building of sun-dried bricks, which could only accommodate about 600 persons, so that on festival seasons a large portion of the congregation had to sit on the ground outside. Subscriptions were collected in 1870 to supply this want; the first stone of a new church was laid in the autumn of that year; and, on the 8th March 1873, the building, still incomplete, was consecrated by the Bishop of Calcutta. Other buildings have been added from time to time as they were required, and as funds were available; but the Mission is still in want of a regular school-room, with suitable class-rooms attached.

The ordinary work at Ránchí, the head-quarters of the Mission, is thus described in the Report for 1874–75:—"Daily morning and evening services, the one about a quarter of an hour before sunrise, and the other at sunset, have gone on uninterruptedly during the year. Holy Communion is celebrated weekly—early in the morning, except on the Sunday after each full moon, and on great festivals, when the service usually begins at 10·30, in order that people from a distance may be able to arrive in good time. To mark festival times, the choir, who ordinarily sit with their schoolfellows in the body of the church, wear their surplices, and sit in their proper place in the chancel on Saturday evenings, Sundays, festival days, and their eves. On Saints' days, &c., a short sermon is preached on the persons and events commemorated."

A church council chosen from members of the congregation meets at intervals during the year; and at the February Harvest Festival, which takes the place of the *Mágh Parab* or *Desauli Bonga* of the unconverted Kols, a general *panchâyat* or conference of the whole congregation is held. At the general *panchâyat* of February 1871, the following subjects were discussed:—(1) The duty of educating children by sending them to village schools, and teaching them at home the elements of religion, such as the Creed, Lord's Prayer, and Ten Commandments, which every baptized adult has learned by heart. (2) Marriage. On this subject it was agreed that money-prices should not be paid for daughters, and that couples formerly united by the native rite should be re-married on becoming Christians.

(3) The necessity of making offerings in money or rice for the service of the church; and the Madras system of *sangam*, or setting aside for the good of the Mission a small portion of each day's household allowance of rice. (4) The duty of offering up daily prayers, and in particular, of praying for the conversion of the heathen. (5) How Christians should regulate their conduct towards the unconverted.

Through the agency of the conferences and church councils, a system of discipline has been introduced, which is thus described in the report for 1873–74:—"The names of the excommunicated are read out before the congregation after the Nicene Creed, and the people are warned against associating with the impenitent; when the time of penitence has expired, a solemn re-admission takes place. Before the commencement of the Communion Service, the penitent is met by the priest at the rail which divides the baptized from the unbaptized and excommunicate, and there makes confession, and asks for absolution, and the prayers of the congregation. This is followed by the absolution and an adaptation of the prayer following in the order for the visitation of the sick, after which the person is introduced into the congregation." Almost all the offences thus dealt with are breaches of chastity; but there were during the year two cases of deliberately giving false evidence, for which the offenders were excommunicated for two months after they had expressed their penitence.

At the Harvest Festival, it is customary for the Christians to bring in, and present before the altar, offerings of their newly cut rice. In 1870, when the late Bishop Milman visited Ránchí, the offerings of rice amounted to about 15 *maunds* or 11 cwts. Baptism is administered at all times of the year, as the Missionaries are reluctant to delay the rite, when a candidate is sufficiently instructed in the nature of the vow he is taking and really desires to enter the church. But the endeavour is to make Easter and Whitsuntide the special seasons for the baptism of catechumens. At Easter 1875, more than 400 persons were baptized in the various Districts attached to the Chutiá Nágpur Mission. These seasons happen to be very convenient for the people, as both are preceded by a time when field work is almost at a stand still, and inquirers thus have leisure to learn fully what is required of them. Although 1535 persons were baptized during 1874–75, there were still 1289 candidates for baptism at the end of the year; and it should be observed that the

number of catechumens is largest in those Districts where there have been most baptisms.

It appears from the Statistical Table on p. 426 that the Christian community in Chutiá Nágpur Proper, excluding Hazáribágh and Cháibásá, is scattered over 320 villages. Owing to the limited staff of the Mission and the want of funds, the supervision and instruction of converts in outlying villages has from the first been a matter of serious difficulty. In October 1869, the whole Missionary District was divided into 35 circles, containing from 10 to 15 villages a-piece; and a reader or teacher was appointed to take charge of the Christians in each circle. Thirty-two chapels and several readers' houses were built, much assistance, in the form of personal labour, being given by the Christians themselves. In Biru, for instance, the Christian headman of the village helped to build a neat brick church and enclosed the burying-ground, called *prabhu ká baghichá*, or the Lord's garden, with a strong fence. But the pressing want was for ordained native pastors to look after the village congregations. Accordingly, in March 1870, seven young men were selected for special training with a view to their being ordained. Five of these were ordained in March 1873, and three more were added to the number in 1874–75. With the help of this increased staff, the system of managing the congregations of distant villages was remodelled as follows:—"The 320 villages are grouped into 48 districts, and these districts again into seven pastorates. It is the duty of the reader of each district to visit frequently the whole of the Christians in his charge. Each pastor visits, less frequently of course, the villages in charge of his readers; and again, an European Missionary visits as many of them as he can, when he goes on his tour. In order to promote systematic instruction throughout the whole Mission, a table of lessons and subjects to be taught is lithographed at our Press and circulated every month. This table contains—(1) A lesson from Holy Scripture for each Sunday and Holyday; (2) the teaching to be drawn from the lesson; (3) a verse of Holy Scripture to be committed to memory; (4) a subject for instruction. It is quite clear that the reading through of the Scripture lessons as appointed in our Calendar (which was drawn up for persons in very different circumstances from ours) would be a mere formality for our rural congregations. Short lessons are chosen which can be explained, if not fully, yet to some extent." In actual practice, difficulties arise in working the scheme, from the reluctance

or inability of the people to come to church regularly, as well as from the slackness of the readers in house-to-house visitation. Besides this, the readers themselves are not very well instructed, while the demand for them is so great that many men have to be sent out to work in villages, before they have been thoroughly taught in Ránchí. Constant superintendence, however, is kept up by the European Missionaries, who visit each native pastor's station once every two months for the purpose of celebrating Holy Communion; monthly returns of the number of villages visited are regularly sent in; and every week the readers assemble at the pastorate head-quarters, to report progress, receive instructions, and read over the lesson for the following Sunday. It is hoped, moreover, that as Christianity, and education with it, gain more hold on the District, voluntary assistance will be given in the work of teaching and preparing for confirmation. Even now there are two villages where the congregation is served entirely by volunteers, who hold services, and prepare catechumens for baptism "in a most satisfactory manner." It may be noticed here that the want of large chapels at the stations of the native pastors is gradually being supplied. At Tapkárá, for instance, where the congregation had outgrown the old building, a new chapel has recently been finished; and on Bishop Milman's visit in 1874, 443 persons were confirmed within the walls, although the roof had not then been put on. Some progress has also been made towards supplying small bungalows, as rest houses for the European Missionaries when on their tours of inspection.

The foregoing scheme of teaching and supervision deals only with those persons who have already become Christians. Hitherto, in consequence of its limited staff, the Mission has been unable to set on foot systematic work among the unconverted. A special endowment, however, has been provided by the Vicar and parishioners of the Church of St Mary, Beverley; and a teacher in the Ránchí boarding-school has lately been ordained, expressly for the duty of preaching among the heathen Kols. The following description of the mode in which the work is carried on is quoted from the Report of 1874-75:—"A village is selected for each day's preaching. In the morning the deacon goes there, and tells the people whom he meets that they are to expect us in the evening. We find that the evening is the only time when the people can be got together. In the evening we go forth carrying two lanterns, a small gong, and some large pictures illustrating the life of our blessed Lord. We go to a con-

venient place in the village which the deacon has selected in the morning, and there strike our gong to call the people together, light our lanterns and arrange the pictures illustrating the part of the life of Christ which we wish to speak of." Nothing need be said here about the Branch Missions in Hazáribágh and Singbhúm. The dates of the foundation of those Missions, with the number of baptized converts in 1874–75, have already been given in the Statistical Account of the Districts in which they are situated.

EDUCATION.—The following notice of the educational system carried out by the Anglican Mission is condensed from the Report of the Director of Public Instruction for 1872–73:—*Boarding-Schools.*—During the past year, the number of pupils in the Ránchí boarding-schools has been remarkably steady. Some lads who had learnt what is ordinarily sufficient for such as get their living by cultivating the ground, were sent to their homes towards the end of 1872, to make room for others; but very few left of their own accord. Very many applications for admission to the school had to be refused for economical reasons. At the end of March 1873, the number on the books was 228, all except 9 being Christians. The boarding-school contains 118 boys and 62 girls, and 48 children attend the school as day-scholars. The average attendance has been 203. The whole school is divided into 10 classes, each having its own teacher. The only non-Christian teacher employed is a *pandit*, who teaches the upper classes Hindí. The standard of education has been somewhat raised during the year throughout the school; and the training class, which is composed of the first-class students and the teachers, have made considerable advance in the subjects on which they have been engaged. There have been 16 in this training class during the year. The scheme of studies is—English, including grammar and reading; Arithmetic up to decimal fractions, and Euclid, book i., props.; Hindí, reading of print and MS.; religious instruction in the Old and New Testaments, and the Catechism; History of India in Hindí; geography. The teachers are engaged eight hours during the day—four hours teaching, and four hours receiving instruction. The plan of including the teachers in the training class, which was commenced nearly two years ago, has answered admirably. It involves a great increase of labour on the part of the head-master, but has produced a great improvement in the teaching staff. A great deal more attention has lately been given to the reading and writing of the Kaithí Hindí, which differs considerably from the

printed character. An improvement has been observable in the teaching of the lower classes. Much less time than formerly has been spent over the alphabet and elements of reading. From the first class, three young men have been appointed to important mission schools in distant villages, and two others have obtained employment in Government *páthsálás*. In the industrial class there were 12 lads; of these four have continued to work, one as a tailor, one as a bookbinder. One has gone to Assam as a school teacher, and two have returned to their homes. *Evening School.*—The evening school at Ránchí, which at the beginning of the year contained only 15 men and boys, assumed considerable proportions during 1872–73; 50 or 60 persons used to attend, half of the number being non-Christians. Nearly all of those who attend the evening school, work during the day. This school owes its success entirely to the exertions of the Rev. W. Luther, native pastor of Ránchí, who has taken the entire conduct of the institution into his hands, and obtained a few volunteers to help him in teaching. At present, the instruction is very elementary. *Village Schools.*—For years past the village schools of the Mission have fallen short of success, for want of better trained teachers and an inspecting schoolmaster. There are now, however, very well qualified teachers in five schools, four of whom are stationed in the same villages with the deacons who were lately ordained as pastors of Christian congregations. An inspecting schoolmaster has also been appointed. His sole work is to go round inspecting every school once a month, examining the classes and reporting on them, and advising the teachers. Signs of improvement are manifest; there is more work being done, and more appearance of life and zeal in the teaching staff. The number of children in every school has increased since the inspector began his regular visitation. In a considerable number of places, evening schools for those who are engaged in the day have been instituted, and are flourishing. There are 11 principal day-schools, containing nominally 273 children, boys and girls. The average attendance is only 189. In the evening schools there are 157 scholars. Want of oil for lighting is very often pleaded as an excuse for the irregularity or non-existence of an evening school; but in the village of Lataulí, the boys of the school raised a crop of oilseed sufficient to supply the school for several months. When the village people are busy and children are obliged to help, the village schools will be closed for a time, and all the teachers will be called in to Ránchí for further training. They

do not teach the alphabet and first elements of reading at all well, and much time is lost by beginners. They will receive instruction in the art of teaching, and will have a class of little boys to practise upon.

Besides the foregoing classes, which belong to the regular educational system of the Mission, there was a special theological class of five students, three Mundas and two Uráons, who had been preparing for ordination since March 1870. The course of study comprised Holy Scripture, Ecclesiastical History of the first three centuries, Evidences of Christianity, the Prayer Book, the XXXIX. Articles, and part of Theophilus Anglicanus. On these subjects few Hindí books are available, so that the greater part of the instruction had to be conveyed orally. Towards the end of November 1872, the class was removed to Murhu, in order to give them some insight into their future work of superintending and instructing the circle readers. At the same time they were instructed in vaccination by one of the regular staff of vaccinators employed in the District.

The German Mission.—In 1872, the first year for which accurate statistics are available, the working staff of this Mission consisted of 6 ordained and 7 lay European Missionaries, 2 native pastors, 50 catechists, 25 teachers, and 105 *práchins* or village elders. Including the three Districts of Chutiá Nágpur Proper, Singbhúm and Mánbhúm, "the total number of Christians belonging to the Mission was 16,916, of whom 166 died and 8 were excommunicated, leaving a balance of 16,742 converts at the end of the year, out of whom 5535 were full church members." By the end of 1873 there were 19,172 baptized converts, of whom 17,271 belonged to Chutiá Nágpur Proper, 1322 to Singbhúm, and 579 to Manbhúm. The number of persons who entered their names as inquirers was 1592; and during the year voluntary subscriptions to the amount of Rs. 1131-2-3 (£113, 2s. 3d.) were collected from the native members of the church. In 1874, a year which corresponds accurately enough for purposes of comparison with the year 1874-75 adopted by the English Mission, the number of baptized converts had risen to 19,355 persons. Of these, 16,877 were inhabitants of Chutiá Nágpur Proper, 1833 of Singbhúm, and 645 of Mánbhúm. The unbaptized inquirers numbered 1587; and the collections from the native congregations amounted to Rs. 1318-2-2 (£131, 16s. 3d.).

The German, like the Anglican Mission, soon found the native congregation too numerous and too scattered for effective supervision

from Ránchí. Accordingly, since 1869 out-stations have been added at Patrasburj, 30 miles to the south-east of Ránchí; at Govindpur or Gossnerpur, about the same distance to the south-west; at Lohárdagá, 40 miles to the west; and at Takarmá, 56 miles to the south-west of Ránchí. Patrasburj was founded by a Russian nobleman, who made over 3000 roubles for the purpose, on the condition that the new station should be called after St Petersburg. Takarmá, in the Fiscal Division of Sasiá, is situated at a point where the three tribes of Munda, Uráon, and Kharriá meet; and is, therefore, particularly well suited for the extension of mission work towards the south and south-west. The station of Puruliá or Frederick Wilhelmspur in Mánbhúm was established in 1863, and that of Cháibásá in Singbhúm in 1864. The Anglican Mission has not attempted work in Mánbhúm, while in Singbhúm the sphere of operations of the two Missions is stated to be distinct.

The work at Ránchí is of a purely pastoral character, and differs little from the routine of the Anglican Mission, which has already been described. The congregation numbers about 200 persons, a large number of whom are in the employ of the Mission. Morning and evening services are held daily, and the attendance of all Christians present in the station is insisted upon, and if necessary enforced. In order to allow the women to attend evening service occasionally, one evening in every week is set apart for their special instruction, and the men remain at home to take care of the house and children. Special mission services are held on the first Monday in every month, when lectures are delivered on the History of the Church and similar subjects, and collections are made from the congregation. In addition to these collections and the Sunday offertories, a yearly tax of four *ánnás* per house is regularly levied, and is said to be readily paid by every one. Offerings are also given at the Harvest Festival in the spring of the year. The Christian prisoners are visited every Sunday afternoon. From an early period, the Mission has been called upon to provide for Christian converts who have lost their land, or in some way been reduced to poverty. This was at first managed by giving them work in Ránchí. But as the number of destitute persons increased, the Mission was unable to supply their wants; and an attempt was made to induce them to settle in Singbhúm, where labour is wanted to bring spare land under cultivation. Very few, however, availed themselves of the offer, and the majority preferred to rent land in the Mission com-

pound, or to work as *rayats* in Lálganj, a village near Ránchí, where the Mission is in temporary possession of some lands.

The following account of the District work around Ránchí is quoted from the Report of 1874:—"The District congregation connected with this station numbers over 3000 souls, who live dispersed in nearly 200 villages in the west and south of Ránchí, and there is only one Missionary to look after them all. It is evident that under these circumstances only a certain number of villages can be visited once a year; and even then the time given to each is very short, scarcely sufficient to enable the Missionary thoroughly to examine the spiritual condition of each family. It follows that the Christians for the greater part of the year, and many of them for the whole year, must be left to the immediate care of the catechists and elders stationed among them. The former are living in places of a central situation, whence they visit the Christians of their circle, and collect them for the usual services. In order to make their work as effective as possible, and to spur them on to continued exertions, they are required to draw up detailed weekly reports of their work. These reports show the number and names of the villages they have been to during the week, and give the particulars of what they have done there. The numbers of services held, of the people present, of the candidates for baptism and confirmation who are under instruction, the texts on which the catechists preached, the amount of money collected, and other particulars, are minutely specified and separately examined at the end of every month, when the reports must be presented in Ránchí. To counteract the deteriorating influences of a prolonged stay in the villages, where the catechists, often themselves young in faith and with little actual experience, are very apt to forget the divine character of their mission, and to take things easy, they are taken for two months into the Station, and instructed in the various subjects which they themselves have to teach, due attention being given to familiarise them with the practical side of their work. The elders, who are supposed to assist the catechists in their parish work, have been, with a few exceptions, of little use. Nominally the heads of a certain number of Christian communities, they have shown little interest in the welfare of the latter, nay we are sorry to say, they have often used the influence, which some of them possess, for purposes diametrically opposed to our intentions. This has been especially the case with those who have joined that discontented party of Christians, who

for many years the principal agitators in the land question, are gaining more influence every year. These misguided people entertain the hope of regaining the possession of their former lands; in fact it has become a fixed idea with them, that half of the *bhuinhárí* land belongs to them, and that the present occupants should be ousted, and themselves put in possession. All our efforts to convince them of the folly of their expectations, and to prove to them the impossibility of their demands being ever fulfilled, have only served to alienate them from us."

The Mánbhúm congregation numbers only 645 persons. This enables the Missionary, who has been there for nearly ten years, to exercise a minute personal superintendence which would be impossible with larger numbers. The Christian community, therefore, in Mánbhúm is a very united body, as was proved by the subscriptions voluntarily levied among them for the relief of the distress in 1874. The Santál portion of the congregation is stated to be, both intellectually and morally, inferior both to the Bhúmij and to the Hindus, who are for the most part Kurmís.

In Singbhúm, the field of operations of the Mission comprises the Fiscal Division of Dhalbhúm with the Bhúmij in the east, Paráhát with the Mundas in the west, and the large Ho tract of the Kolhán lying between the other two. The greatest success has been attained among the Mundas of Paráhát; and nearly all of the 427 converts who were baptized in 1874 came from that part of the District. Since 1869, the Ho dialect has been used as much as possible in the services of the church; and a Kol hymn-book is now being prepared, with hymns composed by the most advanced members of the congregation, and set to native tunes as played on the *bhájan* or drum. But, on the whole, the advance of Christianity in Singbhúm has not been so marked as in Chutiá Nágpur Proper. This is partly owing to the fact that the tenure of land in that District is secure, and the people have not the inducement of the land question to become Christians; while the opposition of the women to the change of religion is said to be particularly strong, and the Report of 1874 narrates a case in which a wife committed suicide because her husband was about to turn Christian. Indeed, most of the conversions that have taken place in Singbhúm are stated to be due either to the influence of relations, or to domestic trials such as illness and the like. When the usual sacrifices to the aboriginal deities have failed to cure a disease, Christianity is resorted

to as the last remedy. Catechists or elders are called in to pray over the patient; or if the evil spirit who caused the illness is believed to live in the sick person's house or in a tree near, he will be taken to the house of a Christian, where the *bhút* cannot touch him. "Our work among the Larkas," says the Report, "is attended by still greater difficulties, owing to their energetic and active character, which makes them all the more disinclined to unbend to any foreign interference. A Larka would sooner die than forsake the manners of his forefathers for the sake of material gain. Their reliance on the efficacy of the offerings dedicated to the Bongas is still unshaken, and we have only been able to baptize twenty-one persons in their county."

EDUCATION.—The following notice of the educational system pursued by the German Mission, is condensed from the Report of the Director of Public Instruction for 1872-73:—The following five schools belonging to the German Mission were in existence in Chutiá Nágpur during that year—A seminary or training class for native pastors, a boarding-school for boys, and a boarding-school for girls, in Ránchí itself; a boarding-school for boys in Burju; a village school in Bodá, near Lohárdagá. The seminary was divided into two classes—the first class numbering seven pupils. The course of instruction comprised singing, arithmetic, general history, geography, Hindí classics, English, Greek, exegesis of the New Testament, inculcation of the principles of positive divinity, doctrine of symbols, homiletical and catechetical exercises, and pastoral theology. The pupils of the second class were instructed in singing, arithmetic, geography, universal history, Hindí classics, English, Greek, Church history, and sacred history of the Old Covenant. The study of Greek was introduced to teach the pupils habits of independent thought, and to discourage a mechanical style of learning lessons by rote. At the close of 1872, the pupils of the first class underwent an examination, at which five of them passed. These have been put in temporary charge of small congregations in the District, under the supervision of the Missionaries, to enable them to get a thorough insight into the practical working of the different parishes, preparatory to their receiving ordination. The remaining two have been employed as teachers, the one in the Ránchí boarding-school, and the other at Bodá, in the Lohárdagá circle. At the commencement of 1873, there were 13 pupils in the seminary, who formed one class. Two of them were dismissed for misconduct, and a third left

because his services were required by his relations. The remaining 10 received instruction in the profane subjects detailed above, to which were added introduction to the different books of the holy scriptures and exegesis of the Old Testament, Church history, and dogmatics. There were on an average 110 boys in the Ránchí boarding-school during the year, who made up seven classes. They were taught singing, reading and writing in Hindí and Roman characters, drawing, arithmetic, geography, sacred and profane history, and catechism. Latterly, it was deemed advisable to teach Kaithí writing, in order to enable the pupils of the schools to meet the requirements of public business, in which this character is largely used. The system of teaching has been regulated in such a way, that those boys who are less gifted can leave school after five years, to make room for fresh comers. By this arrangement, a larger number of Kol boys are brought under the influence of instruction, than would otherwise be possible. The more talented pupils are transferred to the upper classes, and prepared for the seminary. In order to accustom the boys to cleanliness and labour, and to prevent their being alienated from that kind of work which is common to the class of people from whom they come, they have to clean their own rooms, and are also employed after school hours in some out-door works, such as road-mending, gardening, compound-sweeping, &c. Besides this, every boy gets a piece of ground allotted to him, which he may cultivate at his own pleasure. During leisure hours, they play or do gymnastics on a limited scale. Three European Missionaries, assisted by two *pandits* and six native teachers, employ their entire time upon the management of the seminary and the school. Another European, who has been specially trained for this kind of work, has been put in charge of the boarding-house to superintend the household management.

The girls' boarding-school had three classes, and numbered fifty pupils on the average during the year. Instruction was given in singing, reading, writing, arithmetic, geography, Bible history, and catechism. The girls have to cook their own food and make their own clothes, in order to fit them for their future household duties. The Burju boarding-school, with fifty boys in three classes, is under the charge of a European Missionary, who himself takes part in the teaching, and superintends the work of the three assistant native teachers. The instruction was limited to singing, reading, writing, drawing, and religious subjects. The boys remain two years in the

school, and after having received certain elementary training, are sent to their homes. Boys who promise well are put into the higher classes of the Ránchí school. There is a village school in Bodá, in the vicinity of Lohárdagá, under the charge of a master trained in the seminary. The pupils, from twenty-five to thirty in number, are instructed in religion, reading, writing, and ciphering. Similar schools have lately been started amongst the Uráons, west of Ránchí. A large number of Government village schools (*páthsálás*) were established during the year in the neighbourhood of Govíndpur, and voluntarily superintended by the Rev. D. Didlaukies. Eighteen primary schools in this part of the country were under the charge of Christian *gurus* or masters, and were attended by three hundred and thirty-six Christian children. With the exception of the Ránchí boys' school, which receives a grant in aid of Rs. 50 per mensem, all the five schools under the German Mission are maintained solely from funds supplied by the Berlin Committee of Management.

STATISTICS OF THE CHUTIÁ NÁGPUR GERMAN MISSION FOR 1874.

District.	Baptized during the year.		Total No. of Baptized.	Confirmed during the year 1874.	Total No. of Communicants.	No. of School Children.					New Inquirers.	Money collected by the Christians.		
						Boarding.		Village.						
	Inquirers.	Christian Children.				Boys.	Girls.	Christian Children.	Unconverted Children.	Total.		*Rs.*	*a.*	*p.*
Ránchí.....	128	94	3,207	49	1981	142	35	202	97	476	192	191	11	5
Puruliá.....	8	33	645	10	260	27	14	74	3	118	10	179	14	6
Chaibásá...	427	84	1,833	107	516	40	15	164	147	366	322	170	13	0
Patrasburj..	522	190	4,843	111	1075	...	...	268	68	336	1542	486	14	10½
Govíndpur.	373	331	8,000	118	2000	...	...	206	10	216	600	227	13	3
Lohárdagá.	134	20	477	21	70	..	...	42	33	75	49	48	15	1½
Takarma...	...	15	350	...	60	..	..	....	....	...	350	12	0	0
Total ..	1592	767	19,355	416	5962	209	64	956	358	1587	3065	1318	2	2

PROSPECTS OF CHRISTIANITY.—In conclusion, it may not be out of place here to indicate briefly the general causes which further, or retard, the progress of Christianity in Chutiá Nágpur. In the opinion of both Missions, the large majority of conversions are due to an undefined idea on the part of the aborigines, "that, by turning Christians, they will better themselves somehow or other." Accustomed as they are, in their own religions, to the use of incantations

and formulæ of various kinds to avert physical evil, they readily learn to believe in the efficacy of prayer. In a neighbourhood where there are many Christians, it is not uncommon for even an unconverted Kol to call in Christian readers and catechists, to pray over a sick person in the name of Christ, or, as their phrase runs, *Prabhu Jésu ká nám lend*. If a cure is effected, it is usually followed by numerous conversions. Although the Kols are by no means intellectually deficient, they have not the acute critical faculty which has proved an obstacle to conversion in the case of Hindus, and they find no difficulty in accepting the Scriptures as literally inspired. Besides this natural predisposition to belief, they are quick to see certain practical advantages which the status of Christians confers upon them. Converts are at once released from the strong terror of spirits and witchcraft, which haunted them in their unconverted state. They need no longer propitiate the local *bhúts* before cultivating a piece of land; they are spared the continual necessity of paying black-mail to the village witch-finder, and they can even cut the timber of the *sarna* or sacred grove with impunity. For Christian Kols, marriages or funerals are nothing more than simple ceremonies; while for the unconverted, both involve such a heavy expenditure that, not many years ago, marriages were sensibly decreasing in the Kolhán of Singbhúm on this account alone (see Statistical Account of Singbhúm, vol. xvii. pp. 44, 45). Again, in Chutiá Nágpur Proper, the depressed social condition of a large section of the aborigines, and the continual disputes in which they are involved with their landlords as to the tenure of *bhuinhári* and other privileged holdings, have exercised a material influence on the feelings of men who thought that they saw in Christianity "a declaration of independence from the *thikádárs*." On this point Colonel Dalton writes: "When matters came to issue between the simple Kol and the *zamíndár*, or the foreign farmer, the Kol had no chance; and, indeed, he appeared to think so himself, for he seldom sought redress. But the Kols who embraced Christianity imbibed more independent notions, and in several instances successfully asserted their rights. From this the belief unfortunately spread through the District, that when Kols go to court, *as Christians*, they are more uniformly successful than those who have not changed their religion. The next step was to profess Christianity; and going up to Ránchí to the Mission, they returned with their hair puritanically cropped, and were ready to assert their rights and defy their landlords. The demands that were made by

the latter, whether right or wrong, were resolutely opposed. Affrays took place, and blood was shed; and considering the acts of the *nominal* Christians, who took advantage of these disturbances to seize lands to which they had no right, and to extort from *zamíndárs* and farmers what they called compensation for the property they alleged had been taken from them, it is surprising that disturbances of a more serious nature did not break out." These interested adherents have, however, never been recognised as genuine converts by the missionaries themselves; and the reports of both Missions, from 1869 to 1874, are full of doubts as to the motives which have induced large numbers of Kols to profess Christianity. Moreover, it appears from the following extract from the Quarterly Report of the Anglican Mission for 1874, that the effect of the land-question has not been wholly favourable to the spread of Christianity:—"It originated a band of agitators in the country, who have used the grievances of others as an excuse for raising money, under the pretext that measures are being taken to obtain redress from the Government, but with the result that a great deal has been converted to the use of the agitators. Among the earliest converts would naturally be found men of the boldest and most independent temperament, and this would undoubtedly be true whatever were the depth or reality of the convictions of the converts. It is not, therefore, surprising to find that the head agitator, and many, at least, of his principal adherents have been baptized, or enrolled as catechumens, although they became disobedient and unruly Christians some time before the Mission became divided; they have, in fact, now openly set up a dissenting and independent congregation. Happily, many of those who once gave them some help and countenance have now seen the dishonesty of the agitators and deserted them; but the effect of this is twofold:—*First*, the landholders are much inclined to confound the Christians with the agitators, and to look upon them as not only less productive *rayats*, but as introducing into the villages an element of opposition to their demands, whether just or unjust; and, consequently, it is probable that the great bulk of the landholders are not only prejudiced against Christianity, as being strict Hindus and proud of their Hinduism, but are also determined to oppose Christianity as suffering from it in their income and influence. They have, accordingly, not only added oppression to discourage Christianity, but have, in some cases, gone so far as to make the position of the Christians so disagreeable, that they have emigrated in a body

to other villages at a distance with less intolerant landlords, or have gone into the jungle, or out of the country altogether to Assam and other places. *Secondly*, it is not improbable that, in other cases, the very same causes have disposed the minds of some villagers to a more ready acceptance of Christian teaching. It is certain that among the successful opponents of landholders in the earlier years of Christianity were found several Christians; and whether they have received any useful advice from missionaries, or hope to do so, or whether they have any obscure hope of any other kind of assistance or advantage, both these alternatives furnish motives which at least aid in getting rid of the former difficulty, the unwillingness to submit to instruction, and to have the name and reputation of being a Christian. In spite of every exhortation and explanation, it is always found that a man calls himself a Christian as soon as he is formally enrolled as a catechumen, although the departure of the unbaptized from the church before the celebration of the Holy Communion is rigidly insisted on, and enforced by public notice and the assistance of the church officers."

Although it is probable that the balance of the influences which affect the Kols is, on the whole, in favour of Christianity, there are still many permanent deterrent causes. Drunkenness, the love of personal ornament, and a passion for dancing to somewhat indelicate music, are weaknesses common to both Uráons and Mundas. It is a serious trial to them to give up these amusements in the first instance, and there is a continual temptation to indulge in them after baptism. Their taste for music, indeed, may possibly be utilised in spreading Christianity by means of vernacular hymns. But drink presents a serious difficulty, especially in the case of the Uráons, whose native indolence leads them to rest content with the status of mere inquirers, and to avoid any further step which will oblige them solemnly to abjure their favourite indulgence. With both races polygamy is a recognised custom; and this, coupled with the practice of paying a stated price for a maiden to her father, makes them slow to understand the Christian idea of marriage, while their torch-light dances and peculiar arrangements for passing the night cannot promote a rigid standard of sexual morality. Moreover, so long as the vast majority of the population remains heathen, any domestic trouble may induce a Christian to have recourse to the aboriginal methods of propitiating the evil spirits, nor is any system of church discipline feasible when a rupee or two spent in feasting his uncon-

verted friends will restore a pervert to his old position in the village.

In spite of these various difficulties, there is much that is genuine among the present generation of Kol Christians. As a general rule, persons who have been baptized show great respect for church ordinances, and attend service regularly. Even in remote villages, the Christians are conspicuous for abstaining from Sunday-work, and many of them have shown considerable zeal in making proselytes of their unconverted relations or friends. It would appear, moreover, that the influence of the Mission is not confined to Chutiá Nágpur, for there is a congregation of nearly three hundred emigrants at Dibrughar in Lakhimpur District, many of whom became Christians after their arrival in Assam.

Legendary History of Chutiá Nágpur Proper.—The only materials even for conjecture as to the early history of Chutiá Nágpur Proper are the legends of the aboriginal races. From these, it would appear that while the country was still covered with unbroken jungle, and retained its ancient name of Jhárkhand or "the forest tract," the Mundas and subsequently the Uráons effected a settlement on the central tableland. Although the two races did not intermarry, and in many respects remained distinct, they adopted the same system of government by *parhás* or village communes which has been described above (*antè* p. 270). At some time, which cannot be precisely indicated, the *parhá* chiefs were either conquered by, or voluntarily subjected themselves to, the Nágbansí Rájás of Chutiá Nágpur. The traditional origin of that family is as follows:—The great serpent, Pundaríka Nág, escaped from the *yajnya* or incantation by which Rájá Janmejaya purposed to destroy the whole of the serpent race, and transforming himself into human shape, married Párvatí, the daughter of a learned Bráhman at Benáres. He could not, however, get rid of the double tongue which marked his serpent parentage, and this was one day discovered by his wife. In order to divert her mind from the subject, he took her on a pilgrimage to the temple of Jagannáth at Purí. They returned through Jhárkhand, in which the Mundas and Uráons were then established; but as they reached the hill of Sútiámbá, in the Fiscal Division of that name, Párvatí was seized with the pangs of childbirth, and again inquired the reason of her husband's forked tongue. At such a critical time, so runs the story, Pundaríka was obliged to reveal the secret of his origin, even at the cost of immediate separation from his mortal

wife. He accordingly told her who he was, and then disappeared from her sight into a pool of water. "Párvatí," writes Colonel Dalton in his *Ethnography of Bengal*, "was now inconsolable at the catastrophe she had brought about. In the midst of her grief and remorse, her child was born; but instead of rejoicing at its birth, she prepared for herself a funeral pyre and became a *satí*. At this juncture a Sákaldwípa Bráhman appeared on the scene, bearing an image, the idol of the sun. He slaked his thirst at the pool, and when about to proceed on his journey, found he could not lift the idol that he had hitherto carried without difficulty; and whilst pondering on this, his eyes fell on a child lying sheltered and guarded by a great hooded snake. This snake was Pundaríka, in his proper form, protecting his child. Addressing the Bráhman, he narrated his own history, and foretold that the child would become the Rájá of the country to be called Nágpur, that the Bráhman was to be his *purohit* or priest, and the idol his tutelary deity. The boy, he said, was to be called Phaní-Mukuta Ráya, that is, 'the snake-crowned.' After promising, on his own part, to return when his presence was necessary, he confided the child to the Bráhman, and again plunged into the pool and disappeared. It is in commemoration of this event that the Rájá and chief members of the Nágbansí family always wear turbans, so arranged as to make the head-dress resemble a serpent coiled round the head with its head protruding over the wearer's brow. The seal of the Mahárájá and arms of the family show, as a crest, a cobra with a human face under its expanded hood, surrounded by all the insignia of royalty. Near Sútiámbá dwelt Madura, who was Rájá or *mánki* of one of the *parhás*. To his house the Bráhman repaired with the infant, and the *mánki* was easily induced to take charge of the foundling and bring it up as his own child. He had a son of the same age; and when both the boys were twelve years old, Madura convened the *parhá* chiefs, and, it is said, the neighbouring Rájás, the Rájá of Sargújá and the Ditya Rájá, that is, the Rájá of Pátkúm, who claims descent from Vikramáditya; and it was then agreed that Phaní-Mukuta Ráya should be proclaimed Rájá of Chutiá Nágpur. The Uráons had at this time established themselves in the north-western part of the plateau, and were present at Phaní-Mukuta Ráya's inauguration as Rájá. The next event recorded is the marriage of the Snake Rájá with a daughter of the Sikharbhúm Rájá, that is, of the ancestor of the present Rájá of Pánchet. There was an awkward hitch when the

Pánchet Bráhmans asked for Phaní-Mukuta's pedigree, horoscope, and record of his birth; and the match would not have taken place, if Pundaríka had not appeared and proved to the satisfaction of the ambassadors from Sikharbhúm that the marriage proposed would be no *mésalliance*. It is especially mentioned that the Mundas and Uráons all got drunk at the wedding, and had a fight.

"The place pointed out as the scene of the birth of the first Nág Rájá is Pithauria, a considerable market-town on the northern face of the plateau overlooking the valley of the Dámodar in *parganá* Sútiámbá. Many Mundáris regard this part of the country as the cradle of the race, but it is not at present most densely populated by people of that tribe. The representatives of the Madura of the tradition are still to be found tenaciously clinging to the ancestral site and the graves of their forefathers; and, though simple peasants, they enjoy considerable influence, which they sustain by performing at the proper seasons the festivals that commemorate their former power. At all places in the Province of Chutiá Nágpur that are, or have been, the head-quarters of the sovereign or chief, a festival is annually solemnised in his honour, called the *indparab*. Amidst great rejoicings, an enormous umbrella, attached to the end of a mast some forty feet in length, is raised like a maypole by the united force of all the people that can be collected. At Sútiámbá, to the present day, two of these poles are annually set up, one in honour of Madura, the other to the Nágbansí Rájá; and the latter must not be moved from the ground till Madura's umbrella is well aloft. In support of the antiquity of the Nágbansís of Chutiá Nágpur, there is collateral evidence in the annals of the Kharonda dependencies of the Central Provinces. Jagannáth Deo, the last member of the Gangá-bansí families who reigned there, finding himself without heirs, sent to Chutiá Nágpur for a Nágbansí, who founded the present dynasty of Kharonda 860 years ago. The boy selected was a brother of the Satranjigarh chief. This was a collateral branch holding a maintenance grant; and it can be shown that many generations of Nágbansí Rájás had passed away before this branch of the family took root.

"Unfortunately, as the Rájás became great potentates among Hindus, they grew to despise the impure Kols, their subjects; and as the latter were disinclined to submit quietly to degradation, and were not unmindful of what the Nágbansís owed them, they revolted against such ingratitude, and the Rájás found it necessary to seek

extraneous aid. Foreigners were gradually introduced, to whom lands were assigned for military services, who assisted or supported the Rájá in his innovations; and Bráhmans were encouraged by grants of villages to settle in the country, and to aid in civilising it after their fashion. Their attempts at proselytising were not unsuccessful amongst the Mundárís. The chief men of that tribe were by degrees induced to see something very honorific and desirable in the distinction conferred by the *paitá*, the thread indicating that the wearer is a Bráhman or a Rájput; and without altogether rejecting their ancient sylvan deities, they commenced paying their addresses to the new order of gods and goddesses, that the Bráhmans and their now Bráhman-ridden Rájás were endeavouring to bring into fashion. But the change did not extend to the masses generally. They saw the encroachments on their rights and liberties that were threatened, and preferred the freedom of action and license they had hitherto enjoyed. The whole body of Uráons held steadily to this view. And thus, while most of the chiefs in Nágur and Mánbhúm adopted Bráhmanical ideas, the Uráons and the majority of the Mundárís remained in their pristine state; and though intermarriage between the two peoples was not allowed, they otherwise harmoniously amalgamated as one nation.

"The circumstances under which the Rájá's ancestor rose to power precludes his making any division of the Ráj. It remains to this day an undivided estate; and the succession to it is regulated by the local custom of primogeniture, acknowledged under Regulation X. of 1800. But as the families increased, the younger members or collateral branches were supported by maintenance grants, which lapse to the parent estate on failure of heirs-male of the grantee. These were among the earliest of the alienations which changed so greatly the relations between the chief and his people. The latter had agreed to serve and support him, but they were now compelled to serve and support his assigns; and soon the assigns included not only [illegible]ons, but the Bráhmans and mercenaries who received grants for religious or military services, and lastly, foreign farmers, to whom leases of villages were given in supercession of the Kol headmen."

Relations with the Muhammadans.—The following notice of the dealings of the Musalmán Emperors with the Rájás of Chutiá Nágpur is condensed from a paper by Professor H. Blochmann in the *Journal of the Asiatic Society of Bengal* for 1871.

The hilly country now comprised in the Chutiá Nágpur Division

remained independent, both in name and in fact, during the Muhammadan period, until the Musalmán governors of Bengal and Behar failed in their attempts to push their conquests farther to the east, and therefore turned their arms towards the west and south. Their earliest inroads, however, were directed not against the frontier chiefdoms of Rámgarh and Palámau, but against Kokrah or Chutiá Nágpur Proper, which was celebrated at the Mughul court for the diamonds to be found in its rivers. Concerning these occurrences Professor Blochmann gives the following extracts from the Muhammadan chronicles :—

Akbar-námah (Lucknow edition, iii. p. 491). "About the same time (end of 993 A.H., or A.D. 1585, 30th year of Akbar's reign), Shahbáz Khán Kambú sent a detachment to Kokrah. Kokrah is a well-cultivated district between Orissa and the Dakhin, ruled over by Mádhú Sinh. As the country is inaccessible, the Rájá thought that he was safe, and assumed an independent attitude. Our men, however, entered the district, and carried off much plunder. The Rájá became tributary (*málguzár*), and was thus fortunate to get under the shadow of the imperial government." From the same work, p. 641, 37th year, or A.D. 1591 (end) :—"Mádhú and Lakhmi Rái of Kokrah also served in the detachment commanded by Yúsuf Chak Kashmírí." This detachment consisted of the contingents of South Behar and Western Bengal Rájás ; and marched, in the 37th year of Akbar's reign, over Jhárkhand to Midnapur, where they joined the imperial army under Mán Sinh for the conquest of Orissa.

Tuzuk-i-Jahángírí (p. 155). "On the 3d Isfandiármuz of the 10th year of my reign (Safar, 1025, or A.D. 1616) it was reported to me, Jahángír, the Emperor, that Ibráhím Khán, governor of Behar, had overrun Kokrah, and taken possession of its diamond-washings. This district belongs to *Súbah* Behar, and the river (the Sankh), which flows through it, yields the diamonds. When the river contains little water, tumuli (*gorábhá*) and hollows (*ábkandhá*) are formed. The diamond-diggers know from experience that the tumuli contain most diamonds over which insects hover, called by the Hindús *jhíngah*. They pile up stones on all sides of the tumuli, and then cut into them with hatchets and chisels, and collect the diamonds from among the sand and the stones. Sometimes diamonds are found of the value of a *lákh* of rupees each. The District and the diamond-river are in the possession of the *zamindár*, Durjan Sál. The governors of Behar sent frequently detachments into Kokrah ;

but as the roads are fortified and the jungles impenetrable, the governors were generally satisfied with a tribute of two or three diamonds. When I appointed Ibráhím Khán governor of Behar, *vice* Zafar Khán, I told him at the time of his departure to invade the district and drive away the unknown petty Rájá. No sooner had Ibráhím entered on his office, than he prepared himself to invade Kokrah. The Rájá, according to custom, sent a few diamonds and elephants; but Ibráhim was dissatisfied, and invaded the district before the Rájá could collect his men. When he received the news of the invasion, he was in fact already besieged in the pass (*kohdarah*) where he used to reside. Some of Ibráhím's men who had been sent out to look for him found him with several persons, among them his mother, another wife of his father, and one of his brothers, concealed in a cave. They were deprived of the diamonds in their possession; twenty-three elephants besides were taken. The District is now subject to me, and all diamonds found in the river are forwarded to court."

Prof. Blochmann also gives the following extract from a MS. history of Chutiá Nágpur in the possession of Colonel Dalton:—"The 45th king was Maháráját Durjan Sál. In consequence of his having failed for several years to pay his tribute to Dehli, Nawáb Ibráhím Khán came from that city with 2000 cavalry and other troops. Durjan Sál was defeated, captured, and thrown into prison. He offered as ransom jewels, gold and silver to the value of 84 *krors* of rupees, but the Nawáb would not release him. The Rájá and his offering were taken to Dehli, where he was again fettered and sent to Gwálior Fort, and kept in durance for twelve years. Other Rájás were imprisoned in the same place. It happened that at this time two diamonds were brought to the Emperor; and the jewellers who tested them pronounced the best of them to be impure, and the impure diamonds they declared to be sound. The Emperor, therefore, called for Durjan Sál, who was a great judge of diamonds. He pointed out the flaw (*bál*, properly hair); and to prove that he was right, he tied the diamonds to the ends of the horns of a ram, and made the animal fight with another ram, when the diamond with the flaw split, and the *bál* became apparent. The other diamond remained uninjured. The Emperor was so pleased, that he pardoned Rájá Durjan Sál, released him, and restored all the property that had been taken from him. In parting with the Emperor, Durjan Sál was permitted to make any request he pleased. Durjan on this, clasping

his hands as a suppliant, begged that all the Rájás who were imprisoned with him might be released. This was acceded to, and the Emperor gave the Rájá permission to crave another boon. He begged that his former rank might be restored to him, including the right to sit on a chair in the presence of the Emperor. This also was awarded. It was then settled that the Rájá of Kokrah should pay an annual tribute of Rs. 6000."

ACQUISITION OF THE DISTRICT.—The following quotation is taken from Colonel Dalton's *Ethnology of Bengal*. "Chutia Nágpur, as part of Behar, was ceded to the British in A.D. 1765; but the earliest arrangement with the Rájá occurred in A.D. 1772, when he appeared before Captain Camac, commanding a force in Palámau, and after exchange of turbans with the Company's representative, duly acknowledged himself a vassal of that power, gave as tribute Rs. 3000, and agreed to do service against the Mahrattás. The oldest settlement deed is dated 1179 Fasli (A.D. 1772), by which Rájá Dripnáth Sáhi of Khúkra, *alias* Nágpur, agreed to pay Rs. 12,000, viz., *mál* or rent, Rs. 6000, *nazráná* or tribute, Rs. 6000. For some years after this, the Rájá was allowed to administer the territory as the chief of a tributary *mahál*; but in 1816 or 1817, it was found necessary to deprive him of magisterial powers. The estate was placed under the Magistrate of Rámgarh, who held Court alternately at Sherghátí and Chatrá. Natives of Behar, who were considered foreigners in Chutiá Nágpur, were sent into the country as police-officers; and occasionally the *názir* of the Rámgarh Magistrate's Court was deputed, with extraordinary powers, to inspect and report on the administration. Up to A.D. 1831, when the most serious revolt of the Kols of Chutiá Nágpur occurred, there can be no doubt that the changes of government which had taken place were not beneficial to them. They were neglected by their new masters, oppressed by aliens, and deprived of the means they had formerly possessed of obtaining redress through their own chief. The Rájá, by no means satisfied at his own loss of dignity and authority, gave but surly answers to complainants who came before him. The *dárogás* or native police-officers, the highest resident officials under the British Government, declared it was not competent for them to decide on the grievances that most harassed the Kols; who complained that they had been dispossessed by foreigners, Muhammadans, Sikhs, and others, who had obtained from the sub-proprietors farms of the Kol villages over the heads of the Kol headmen. It often happened

that the unfortunate Kol, who with difficulty made his way to the far-off Station, found the tables turned on him when he got there. A host of witnesses in the pay of the opposite party were already on the spot, prepared to prove 'that he had not only no rights in the land, but was a turbulent rebel besides.' Major Roughsedge, the first Political Agent for the South-Western Frontier, notices a case of this kind that occurred in A.D. 1811. Some disturbances had broken out in Tamár, and troops were sent there. The officer in command reported that they arose entirely from the oppression exercised by the Tamár Rájá on one of his vassals, named Raghunáth Sinh; and the officer was allowed to enter into negotiation with the malcontents, who, hoping for redress, returned to their allegiance. In this hope, Raghunáth Sinh went to the court then sitting at Chatra. 'The evidence kept in readiness against him by the Tamár *zamíndár* caused his committal to the Court of Circuit, and the result was his condemnation to transportation or imprisonment for life.' Years after this event, Tamár continued in a disorganised state. In 1820, serious disturbances broke out; and two Kols, Rudu and Kantu, at the head of three hundred followers, for a long time defied the authorities, and were not reduced till military operations on an extensive scale were undertaken against them. The Kol insurrection of 1831, though, no doubt, only the bursting forth of a fire that had long been smouldering, was fanned into flame by the following episode:—The brother of the Mahárájá, who was holder of one of the maintenance grants which comprised Sónpur, a *parganá* in the southern portion of the estate, gave farms of some of the villages over the heads of the *mánkis* and *múndas*, to certain Muhammadans, Sikhs and others, who had obtained his favour. Twelve villages, that had belonged to Sinh Rái *mánki*, were thus given to the Sikhs; and not only was the *mánki* dispossessed, but two of his sisters were seduced or ravished by these hated foreigners. A similar complaint was made against the Muhammadan farmers. One of them had acted very oppressively towards a *múnda* of Bandgáon in Singbhúm, and, it was said, had abducted and dishonoured the *múnda's* wife. These men, with some other *mánkis* of Sónpur, who were equally dissatisfied, invited all the Kols of Sónpur, Tamár, and Bandgáon to assemble at the village of Lankah in Tamár. The meeting took place, and the conveners addressed the assemblage. 'The Patháns and the Sikhs,' they said, 'have dishonoured us; the Kunwar Harnáth Sinh has forcibly deprived us of our villages, which he has given to

the Sikhs. Our lives are no longer of value. We are all brethren, let us act together.' It was agreed that the wrongs inflicted on them could no longer be tolerated. They would at once 'commence to burn, plunder, murder, and eat.' This was no vain threat. A few days after the meeting, on the 11th December 1831, a raid was made on the village of Kamrang, held in farm by Muhammad Alí Náik, and two hundred head of cattle carried off. On the 20th December, a number of villages bordering on Singbhúm, held in farm by two Sikhs, Hari Sinh and Diyál Sinh, were plundered and burned by a body of seven hundred Kols under Súrga, the aggrieved *múnda* of Singbhúm, Singrái *mánki*, and others, and one of the Sikhs was wounded. These villages formed part of the estate from which Singrái had been ejected. On the 25th December, several villages, held in farm by Kálí Khán and Saifullah Khán, were plundered and burned, and one of the Khán's men was thrown into the fire. On the 2d January 1832, Kamrang was again attacked; and next day they sacked Jafar Alí's village, and murdered him and ten of his people, including the unfortunate Kol woman whom he had seduced. The *názir* of the Shergháti Court now appeared on the scene, and sent to the Kols to say that, if they would desist from disturbing the peace of the country, their lands would be restored to them. They replied, they would attend to no orders but those that emanated from the Mahárájá of Chutiá Nágpur; that they would not leave a single foreign farmer alive; they would destroy every village in Sónpur *parganá*, even Govíndpur, where Harnáth Sáhi resided, and then they would wash their weapons in the river Káro that flows by his house! In the meantime, the arrows of war were being circulated through the country like the fiery cross; and by the middle of January, the Mundáris and Uráons had all entered with zeal into the spirit of the insurrection. The country appears to have been entirely unprepared for such an event; troops there were none, the police stations were generally abandoned, and even the hereditary *samánt dárs*, connections of the Rájá, sought safety in flight. In every *parganá*, the villages in which *sads* (Hindus) resided were destroyed, and all *dikos* (foreigners) who fell into the hands of the insurgents were murdered. The subordinate Rájás of Ráhe, Búndú, Tamár, Barwá, though neither *sads* nor *dikos*, narrowly escaped with their lives, when those places were sacked and destroyed. With the exception of the force from Singbhúm that came to the aid of the insurgents, and formed the most formidable division of the rebel army,

it does not appear that the Kols, in their work of destruction, moved far from their own homesteads, as the *sad* portion of each village was plundered and burned by the Kols of that or neighbouring villages. The murders were most numerous in the Doisa and Koráimbe *parganás*, as the *sads* there were unprepared for the attack; and none were spared that fell into the hands of the insurgents. Troops to put down the insurrection were, of course, being collected from different points, and were gradually concentrated in the disturbed districts; but before military operations could be undertaken, the insurgents had done all that they had threatened to do, and might, though it is not again mentioned, have washed their weapons in the Káro, and retired. Captain (the late Sir Thomas) Wilkinson reached Pithauria, which is on the brink of the northern face of the plateau, about the middle of January, and the work of incendiarism was then in full blaze. He was without sufficient force to penetrate far into the disturbed districts, but he lost no time in compelling the villages near Pithauria to submit. This was not done without fighting; and indeed the insurgents, on more than one occasion, threatened his position, advancing against it with a force estimated at about 3000 fighting men, but they appear to have been easily repulsed. The inhabitants of the large village of Nagri, between Ránchí and Pithauria, had been particularly active in the work of destruction, and had avowed their determination to fight to the last; but an expedition was sent specially against them with the unequivocal instructions, 'Attack, slay, and destroy,' and to such orders, energetically carried out, the Nagrí heroes speedily succumbed. This is a very primitive Uráon village, which up to the present time retains all the old institutions: the bachelors' hall with the banners, yaks' tails, trumpets, and drums, &c., and the dancing arena in front, where songs are often sung that remind the young men how their fathers 'went out' in 1832. The subjugation of Nagrí was followed by the submission of most of the northern villages. But the Uráons of the west and Mundáris of the centre and the south showed no inclination to lay down their arms; and the insurrection now spread into Palámau, where it was taken up by the Kharwárs, merely, it would seem, for the love of the thing. It grew serious, however; and a squadron of cavalry, while making its way to Chutiá Nágpur through that *parganá*, found itself so hotly opposed in one of the hill passes, that the officer in command deemed it necessary to make a retrograde movement and await reinforcements. Not till the middle of

February were the troops in a position to operate on a scale adequate to the occasion. Then three columns were formed, to start simultaneously from three points in the northern part of the plateau, and sweep the country in parallel lines as they moved from north to south. The right and centre columns met with little opposition, the heads of villages submitting as they advanced; but the left column, when they reached Sónpur, found that the Kols had abandoned their villages, and, with their flocks, and herds, and families, had taken refuge in the hills. In attempting to dislodge them, the troops, especially a detachment of the Third Light Cavalry, suffered some loss. The columns, however, were now concentrated in the south. Bindrai *mánki*, Singrai's brother, and Súrga, the heroes of the episode, held out to the last, but on the 19th March 1832 these leaders came into camp and surrendered to the Commission. The remaining *sardárs* all then tendered their submission, and the insurrection was at an end. Great changes in the administration followed this insurrection. The disturbed districts and jungle *maháls*, with the dependent tributary *maháls*, were organised as a Non-Regulation Province, under the name of the South-Western Frontier Agency; the system of *zamindári* police, under which authority was restored to the chiefs to whom the people had been accustomed to look for its exercise, was established in Chutiá Nágpur; the border *mánkis*, whose dispossession from their tenures was the main cause of the insurrection, were reinstated, and the *zamindárs* were deprived of the power of ousting them without the orders of the European officers now placed at the head of the District. The *mánkis* obtained title-deeds constituting them *ghátwáls*, or guardians of the passes, and officers of police, and that position they still hold."

The system of government which prevailed under the South-Western Frontier Agency has been treated of in the Statistical Account of Hazáribágh District (*ante* pp. 20, 21). The headquarters of the Agent were at Kishanpur, a small village within the municipal limits of Ránchí, where the District Jail now stands. By Act XX. of 1854, the designation of the Province was changed from South-Western Frontier Agency to Chutiá Nágpur, and it has been administered since that date as a Non-Regulation Province under the Lieutenant-Governor of Bengal. At the same time, the title of the chief executive officer was changed from Governor-General's Agent to Commissioner.

Early History of Palámau.—The now semi-Hinduised and

broken tribe of Máls are said to have been the first settlers who obtained a permanent footing in Palámau. Local tradition says that the old town of Palámau, the important trading mart of Garwá, and the villages of Dándá, Lakhná, and Málhattiá were of their building. But the Máls themselves have disappeared, and are now found only in the Tributary States of Sargújá and Udaipur. The Sargújá members of the tribe allege that they were driven out of Palámau by force of arms. It is a common belief in the Subdivision that the Máls were a very wealthy race; and that parties of them return occasionally to the sites of their ancient settlements, seeking treasure which their ancestors buried in the hurry of flight. It is not certainly known who supplanted the Máls, but their conquerors may well have been the tribe of Ráksel Rájputs, who in their turn were driven out by the Cheros and made for themselves a kingdom in Sargújá. The traditional account of the arrival of the Cheros in Palámau is thus given by Mr Forbes in his Settlement Report, as it was told to him by a former *kánungo* or accountant of the *parganá*. It is possible, however, that the whole story may be a Brahmanical fiction, designed to cover the aboriginal descent of the Cheros; and in any case, it has no claim to historical accuracy. Bhagwant Rái, a predatory Chero leader from Bhojpur, is said to have taken service with a large body of retainers under the Ráksel prince then ruling in Palámau, and to have treacherously seized the supreme power, when the Rájá went to Sargújá to celebrate his son's marriage with a daughter of the chief of that state. On hearing this news, the Ráksel made no effort to regain his kingdom, but murdered the Sargújá chief and founded the Ráksel Rájput dynasty, which is in possession of Sargújá at the present day. The descendants of Bhagwant Rái were Mahárájás of Palámau, until it became a Government estate in 1814. According to the *kánungo's* story, the fourth Mahárájá, Mední Rái, surnamed the Just, made himself lord-paramount of large portions of Hazáribágh, Gayá, and Sargújá, and undertook an expedition against the Mahárájá of Chutiá Nágpur Proper, in which he sacked the palace of Doisá, and built with the plunder thus won the old fort of Satbarwá near Palámau. One of the gates of this fort is still called the *nágpurí darwázá*; but the name more probably refers to the aspect of the gate, and the entire story of the invasion may have grown up insensibly to account for the name. From the shadowy outline of Chero supremacy in Palámau, I pass on to the authentic history of three Muhammadan

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invasions of the country. Here again I have availed myself of Prof. Blochmann's paper in the *Journal of the Asiatic Society*, referred to above. On this subject, local tradition, as collected by Mr Forbes from the Mowár of Monátú, one of the oldest inhabitants, says that it was in Sháh Jahán's time, about 1627 A.D., that Abdullah Khán, Governor of Behar, first made demands upon the Palámau Rájás. "He was engaged at the time in settling matters with Prataṕ Sinh Ujjainiá, a Rájput chieftain who held considerable territory in Bhojpur. Abdullah, though unable to come himself, sent forward Muazzam Khán, the Rájá of Dumráon in Sahansrám (Sasseram), as an advance guard, to clear the way and prepare a passage for Abdullah's troops. Muazzam Khán, on getting to the small stream which lies at the foot of the Bhábulthán or Monátú Pass, was met by Rájá Ghulám Husáin, the Rohilá chief of the Kothí fort, and a rebel; a fight ensued, and Muazzam was killed. The field or piece of land on which he fell is called the Muazzam Khání-khet to this day. Muazzam Khán's force then returned." The date given above for Muazzam's defeat is too early by thirteen years, as it is clear, both from the Mowar's story and from the subjoined account, that this stubborn resistance to the advance guard was immediately followed by the first systematic invasion in A.D. 1641–42, which is thus described in the *Pádisháh-námah*, ii. 248 to 250.

"Palámau lies south of Patná, the distance from the latter place to the northern boundary of that district being fifty miles. The distance of the fort, where the *zamíndár* of the district resides, from the (northern) boundary is thirty miles. The short-sighted rulers of Palámau trusted to their mountain fastnesses, which are difficult of access and full of jungle, and showed no signs of obedience to the imperial governor of *súbah* Behar. Prataṕ, whose family, generation after generation, had ruled over the country, an infidel like all his ancestors, had neglected to send the customary *peshkash* to Abdullah Khán Bahádur Fírúz-jang, the former governor of Behar; and the *súbahdár*, engaged as he was in operations against the rebellious Prataṕ Ujjainiá [Rájá of Bhojpur], had hitherto had no opportunity of bringing him to his senses. This made the Chero so haughty, that he also disobeyed Sháista Khán, the new governor. Sháistá at last reported matters to court; and his Majesty [Sháhjahán] ordered the *súbahdár* to call in the contingents of the *jágírdárs* of the *súbah*, drive away the *zamíndár*, and 'clear the country of the filth of his unprofitable existence.'

"Leaving his son Muhammad Tálib, with 500 horse and 1000 foot, o hold Patná, Sháistá marched on the 17th Rajab 1051 [12th October 1641 A.D.] with about 5000 horse, taken partly from impe- ial regiments and partly from his own contingent, and 15,000 oot, consisting of his own men and *zamíndárí* troops. The rder of march was as follows:—Sháistá commanded the centre *kol*), which was made up of imperial troops; Zabardast Khán vas in the vanguard (*harávval*); Atash Khán Dakhiní and several ther officers commanded the left wing (*búranghár*); and others, he right wing (*juranghár*). Sayyid Mírzá, brother of Mukhtár Khán, with a few other officers, commanded the rear (*chand- ával*). Having made these arrangements, he set out for Gayá, which forms the boundary of the province of Patná and bor- ders on Palámau, and entered the hostile territory through the Monátú Pass. Wherever he pitched his camp, he had trenches dug, the earth of which was formed into a wall surrounding the whole of the encampment, and matchlock-men were placed as guards in the trenches to frustrate night-attacks. A large party was employed to cut down the jungle, and make a road wide enough for the army to advance. All settlements on both sides of the road were plun- dered and destroyed. The wretched enemies withdrew on every occasion to the jungles and the hills, and trembled like victims in the hands of the butcher. The swords of the soldiers, 'swords of pure water, delivered many unto the fire of hell;' others escaped half dead with fright. Of our troops also some were wounded, and a few fell martyrs in this holy war.

"On the 5th Zí Qa'dah [26th January 1642], the victorious army left the station Arú (properly Arú) and directed its march upon the north side of Fort Palámau. The enemies collected at a place where two roads crossed (*bar sar i durúhah*), but fled after a short engagement. As the fort was on all sides surrounded by impassable jungle, Sháistá Khán sent an officer of one of his own contingents with a party of coolies, hatchet-bearers, a detachment of matchlock- men and archers, to cut down the trees and clear a spot for the tents. Having marked off a place near a garden close to the fort, they began to cut down the trees, when the enemies rushed upon them from all sides; but our men with God's assistance were victo- rious, and killed many of them. Sháistá, on hearing of the engage- ment, sent at once a detachment of imperial troops and of his own men to their assistance, and, together with Zabardast Khán, took up

a position on the banks of a river which flows below Fort Palámau. The enemies, covered by the houses outside the fort, fired upon him, and as a number of our troops suffered martyrdom, the men dismounted and occupied the summit of a hill which commands the fort. The firing lasted till evening, and large numbers were killed and wounded. Pratáp saw the courage of our troops, and convinced himself that there was no other help but to submit; he therefore sent a message, and offered to pay a *peshkash* of Rs. 80,000 if he obtained free pardon, promising at the same time that he would never again in future rebel. He was so overawed, that he even engaged to pay his respects at Patná. In consideration of the heat and the approach of the rains, Sháistá Khán, at the recommendation of several loyal officers, accepted the proposal; and after receiving the *peshkash*, he returned to Patná on the 22d Zí Qa'dah [12th February 1642]."

Pádisháh-námah, ii. 356 to 361. "Pratáp, however, failed to secure the affection of his people, and offended his chiefs, who watched for an opportunity to get rid of him. When Itikád Khán had been appointed to the government of Behar, he was waited upon by Daryá Rái and Tej Rái, paternal uncles of Pratáp. They tried to obtain his favour, and proposed to imprison their nephew and hand him over to the *súbahdár*. Both then returned to Palámau, and with the consent of others imprisoned him. Tej Rái was made Rájá. When the governor came to hear of it, he wrote to Tej Rái to hand over Pratáp, but Tej Rái put him off with subterfuges, and sent a *vakíl* to make excuses.

"Pratáp had been for some time in prison, when Daryá Rái, Tej Rái's elder brother, together with several other Chero chiefs, became dissatisfied with Tej Rái. The conspirators found support in the *súbahdar*, Itikád Khán, who advised them to submit to the imperial government; and Daryá Rái and his party sent him a message to say that, if he would send a trusted officer with an army, they would hand over to him Fort Deogan, which is an important *tháná* in Palámau, and would, besides, do whatever he should tell them. Upon this the governor of Behar sent Zabardast Khán with the ruler of Sháhábád to Palámau. On the 1st Sha'bán 1053 A.H. [5th October 1643 A.D.], Zabardast Khán arrived at Deogan, and was waited upon by Daryá Rái, his sons, and the two commanders of Deogan, Bhowál and Champat, who handed over the fort. The Khán then sent Daryá Rái with some of his own men to

Itikád Khán. The inhabitants of Deogan partly submitted and were promised the protection of the imperial government; but others rebelled and were imprisoned. Zabardast now appointed a party of men to cut down the jungle and widen the road that leads to Palámau, and commenced to repair and strengthen the fortifications of Deogan. On the 11th of the same month [15th October 1643], the Khán received intelligence that Tej Rái had sent his *vakíl*, Madan Sinh Thákurái, and other chiefs, with about 600 horse and 7000 foot, to Báolí Cheraon, a village which lies about ten miles south of Deogan; and that two other corps had been sent *viâ* Mordah and Kundah, and were ready to commence hostilities. A detachment of the first-mentioned corps even advanced four miles nearer, with the object of making an attack by night. The Khán sent out a division to oppose them; several of the hostile troops were killed and the remainder fled. On the 16th [20th October], Itikád Khán having heard of Zabardast's advance, ordered Abdullah Najm-i-sání, *bakhshí* of *súbah* Behar, to march, with Daryá Rái and a strong corps, to the support of Zabardast Khán, and prepared himself to follow, should it be necessary. By the help of the good luck which so signally furthers the policy of the imperial government, it happened that on the 3d Ramazán [5th November 1643], Tej Rái left Fort Palámau with a hunting party. During his absence, Súrat Sen and Sabal Sen, sons of the *vakíl* Madan Sinh Thákurái, declared for Pratáp, took off his fetters, and having brought over the garrison, put him in possession of the fort. Some of Tej Rái's companions returned afterwards to Palámau and were let in; others fled, whilst Tej Rái, who now stood between two fires, concealed himself in the jungles. Madan Sinh Thákurái and two or three other chiefs, who lay encamped in front of the imperial army, fled in the middle of the night with a great number of their men. On receiving this information, Zabardast Khán left Dharnídhar, a native of Ujjain, with a detachment of his own men as garrison in Deogan, and marched on the 5th Ramazán [7th November 1643] upon Palámau. He passed through a dense jungle, forced several difficult passes, and arrived at Mángarh.

"Pratáp, seeing that resistance was useless, wrote to Zabardast Khán that the arrival of the imperialists was a deliverance sent him by God; he willingly submitted to the government, and would be glad to be allowed to wait on him. Zabardast had occupied the village of Bárí, six miles from Palámau, and replied to Pratáp's

message that the Rájá would have to come with him to Itikád Khán; if he should not like that, he ought to remember that the *bakhshí* of the *súbah* was about to arrive with a strong corps, when escape would be impossible. Pratáp answered that when Sháistá Khán ere this had come with a large army to the walls of Palámau with the object of taking it, he had not been obliged to wait on him, Sháistá having contented himself with receiving the *peshkash*, when he returned. He had no objection to wait on Zabardast Khán; but as none of his illustrious predecessors who had been rulers had ever gone to Patná, he would not promise to go there. Zabardast in reply said, that he would have either to go to Patná or perish. After several other messages, Pratáp declared himself willing to go to Patná, though it be, he said, against the wishes of his party; but he requested Zabardast to give him a letter of safety, and promise him that he would do him no harm. This Zabardast agreed to, and Pratáp had an interview, at which he gave the Khán an elephant. As he was still willing to go to Patná, Zabardast asked Itikád Khán to send him a letter of safety, and wrote to Abdullah Najm-i-sání that, as Pratáp had submitted, it was no use for him to advance beyond where he stood, since he himself was on the point to return. On the 17th Ramazán [19th November 1643], Zabardast left Palámau accompanied by Pratáp, and on the 22d joined Abdullah Najm-i-sání at Deogan, from whence both marched to Patná. Pratáp presented Itikád Khán with an elephant, and agreed to pay into the imperial treasury a *peshkash* of one *lákh* of rupees, which Zabardast was to receive. Itikád then sent a detailed report to court, and recommended Pratáp for a *mansab*. Thereupon his Majesty appointed Pratáp a full commander of 1000 horse; the *jamá* of Palámau was fixed at one *kror* of *dáms* [250,000 rupees], and the district was left him as a *tuyúl* [tenure held on condition of recruiting troops for the imperial service.]" The *Pádisháh-námah* records no further conflict between the Mughul government and Palámau. From a remark on p. 733 of the second volume of that work, we find that Pratáp was still alive in 1057, or A.D. 1647.

The following extracts are taken from the *Alamgír-námah* (pp. 648 to 660, 673, 972). The translation is not literal, for the ornate style of the work renders a close version undesirable.

"The heathenish *zamíndárs* of Palámau, trusting to the inaccessibility of their country, had not only shown neglect in paying the stipulated *peshkash*, but had also encroached on imperial lands ad-

ascent to their country. When therefore Dáúd Khán, governor of Behar, had returned from the expedition to Bengal, and had brought several other refractory *zamíndárs* to their senses, his majesty (Aurangzib) ordered him to invade Palámau. The *jágírdárs* and *faujdárs* were at the same time ordered to place themselves and their contingents under his orders. On the 2d Sha'bán of the same year in which he had subjected other rebellious *zamíndárs* [3d April 1660], Dáúd marched upon Palámau, accompanied by Mirzá Khán, *faujdár* of Darbhangah, Tahawar Khán, *jágírdár* of Chainpur, Rájá Bihrúz, *zamíndár* of Monghyr, and other officers of the *Súbah*.

"Palámau has two stone forts, one on the top of a mountain, the other on even ground near a large river. The whole country is very mountainous and full of jungle. Besides, there are three other forts near the Behar frontier, viz., Kot'hí, which lies fifty miles from Palámau; Kundah, fourteen miles to the left of Kot'hí; and thirdly, Fort Deogan, at a distance of twenty miles to the right of Kot'hí. During the reign of Sháhjahán, Abdullah Khán, and after him Sháistá Khán, had attacked Pratáp son of Balbhadr, the Chero; but they had not annihilated the Rájá. Dáúd Khán contemplated the total subjection of the country, and first marched upon Kot'hí, which he reached on the 5th Ramazán of the same year [1070 A.H., or 5th May 1660]. The enemies were so terrified by his unexpected arrival, that they deserted the fort, and Dáúd took possession of it. He then moved to Kundah. This fort is very strong and lies upon a hill. It is only ten miles from Kot'hí, but the road passes through dense jungle, and half-way there is a high hill and a difficult pass. The trees, therefore, had to be cut down to a distance of two miles from the fort. The determined advance of the imperialists frightened the enemies from this fort too; and on the 4th Shawwál [3d June 1660], Dáúd took possession of it, and in a short time razed the fortifications to the ground. As the rains were setting in, he erected at every sixth mile between Kot'hí and Kundah fortified encampments, placing in each 100 horse and a detachment of matchlock-bearers and *zamíndárí* troops, so that provisions might safely be sent from Behar to head-quarters.

"When the rains were over, he set out for Palámau, without paying attention to proposals made by the Rájá that he should accept a *peshkash* and return to Patná. On the 1st Rabí' I. [25th October 1660], Dáúd commenced his march. Mirzá Khán, with 300 horse and 200 matchlock-bearers, formed the van; Tahawar Khán, with 700 horse

and 300 foot, held the right wing; Shaikh Tátár, son of Dáúd's brother, with 500 *tábínán* or feudatory horse, and Rájá Bihrúz, with 400 horse and 1500 foot, commanded the left wing; whilst Dáúd Khán in person occupied the centre with 2000 horse. He also told off 500 horse of his own contingent to form the rear. Besides, a strong detachment of hatchet-bearers was appointed to cut down trees and clear the road to Palámau. During the march, Dáúd erected *thánás* at suitable places, and garrisoned them. He advanced most cautiously, and during the first nine days passed over only twenty miles. On the 9th Rabí I. [3d November] he reached the village of Narsí [Tarhasí], which lies fourteen miles from Fort Palámau. The Rájá had during all this time repeated his futile proposals; and when Dáúd reached Narsí [Tarhasí], he was again waited on by Surat Sinh, the Rájá's minister, who promised unconditional submission. The *vakil* especially addressed himself to Rájá Bihrúz, and begged him to intercede, proposing to pay one *lákh* of rupees as *peshkash*, and a present of Rs. 50,000 for Dáúd. The humility of the Rájá, and his urgent solicitations to obtain peace, made Dáúd so far favourably inclined to his proposal, that he sent a report thereof to court, suspending hostilities till the arrival of his Majesty's orders. During the armistice, the enemies intercepted a convoy at a place about sixteen miles from the imperial camp; and though the Rájá sent the *vakil* to express his regret at the untoward event, which, he said, had taken place without his knowledge and sanction, and tendered Rs. 50,000 as part payment of the stipulated *peshkash*, Dáúd thought it advisable to advance. He left Tarhasí on the 8th Rabí' II. [1st December], and pitched his camp at the foot of a hill six miles distant from Palámau. On the 16th [9th December], he moved two miles nearer. The enemies then advanced from the fort, threw up earthworks, and occupied the trenches in large numbers.

"About the same time orders came from court; the Rájá was to embrace Islám, pay *peshkash*, and remain in possession of his country; if he refused, Dáúd was to annihilate him, destroy the forts, and annex the district. His Majesty's answer was then conveyed to the Rájá. Before he had replied, Tahawar Khán, on the 24th Rabí' II. [17th December], unable to suppress his eagerness to fight, attacked the enemies without the knowledge and sanction of Dáúd Khán, and engaged them near their earthworks. Dáúd was thus obliged to push forward, and advancing within the reach of the enemies' bullets, threw up earthworks and commenced a bombardment which was

continued till sunset. The fighting on both sides was obstinate. Tahawar Khán, who was nearer to the enemies, had sixteen men killed, and fifty men and many horses wounded, and retreated towards evening, at Dáúd's orders, upon the centre. During the night, the enemies brought two large guns from the fort, placed them on the earthworks, and managed to kill several of our men and horses. The Rájá also sent a message to Dáúd to say that he refused to accept his Majesty's conditions. The fire of the enemies did in the meantime much damage, directed as it was from an eminence on Dáúd's trenches. He therefore occupied the hills which command the fort, threw up new earthworks, placed upon them several guns, and commenced a well-directed cannonade. On the 27th Rabí' II. [20th December], the enemies could no longer hold their trenches, retired nearer to the fort to the banks of the river, and threw up new earthworks. The space between their position and the imperial camp being overgrown with jungle, Dáúd for two or three days cut down the trees, and having cleared a road, advanced against the enemies. Shaikh Tátár and Shaikh Ahmad, both sons of his brother, with troops of his contingent, several imperial *mansabdárs*, and the son of Rájá Bihrúz with his followers and a detachment from Mírzá Khán's contingent, were placed on the left, and were ordered to attack the enemy from the passes; Shaikh Safí with a division was sent to the right; and Dáúd Khán, Mírzá Khán, Tahawar Khán, Rájá Bihrúz, Abú Muslim, Sayyid Najábat, and several *mansabdárs*, formed the entre. The attack was simultaneously commenced on all three sides, and the ground was warmly contested till the second watch (midday). The enemy was repulsed on all points; many were shot and cut down, and others escaped. It had been Dáúd's original plan to occupy the trenches dug by the enemy, and commence a siege; but the soldiers could not check their fury, and rushing to the river, they crossed it, and attacked the fortifications which surround the town (*shahrband*) at the foot of the fort. The enemies became bewildered and withdrew to the higher fort. The Rájá now sent his whole family and valuables to the jungles, and continued the defence. The imperialists in the meantime had taken the lower fortifications, and stood before the gate of the upper fort, where the fight raged till the first watch of the evening. Half a watch later, the Rájá fled to the jungles, when the whole fort was occupied by the victorious army. The town was cleared of the 'filth of the existence of the infidels,' their idol temples

were destroyed, and Islámitic prayer filled the place. The loss of the imperialists was 61 killed, and 177 wounded. Of the enemies a large number was slain and wounded, some escaped, and others were taken prisoners. A few days later, it was reported that the enemies had assembled about Fort Deogan. Dáúd Khán despatched a division under Shaikh Sáfí to retake the fort. On his arrival there he laid siege to the place and took it.

"Dáúd remained for some time longer in the district, arranged financial matters, and fortified several strong places. He then handed over the government to Mánklí Khán, who had been appointed by his Majesty *faujdár* of Palámau, and returned to Patná. On the removal of Mánklí Khán, Palámau was placed under the immediate orders of Lashkar Khán, the new *súbahdár* of Behar, Safar 1077 [August 1666]."

A large picture of the attack on Palámau fort by Dáúd Khán is preserved by his descendants at Dáúdnagar in South Behar; it was recently photographed in several pieces (it measures thirty feet by twelve, and is painted on cloth) by Mr T. F. Peppè of Ránchí. The following detailed description of it is quoted from a paper by Colonel Dalton in the *Journal of the Asiatic Society* for 1874:—

"The picture represents the camp of Dáúd Khán on the 16th Rabí' II., the entrenchment of the enemy, and the different positions from the first attack on the Chero position by Tahawar Khán, which opened the fight rather sooner than Dáúd had intended, to the final capture of the fort and flight of the *gawárs*, or wild tribes, as the enemy are contemptuously called, on the 27th Rabí' II., 1070 [20th December 1660].

"The first division of the picture shows Dáúd's entrenched camp, an oblong enclosure. On two sides, the front and right, large guns are in position; to the rear of numerous small tents in the enclosure is a row of pavilions, with banners in front of them, in the following order:—

LEFT WING.

Black and Yellow Banner.
Rájá Bihrúz.

Two White Banners.
Shaikh Tátár.
Shaikh Ahmad.

CENTRE.

White Banner.
Dáúd Khán.

RIGHT WING.

Banner with Embroidered Border.	*Three-Tailed Banner Golden.*	*Red-Bordered Banner.*
Muhammad Záhid Bakhshí of Behar.	Mírzá Khán.	(Colour eaten away.) Tahawar Khán.

"The advance of the army from the fort is in the same order. The banners are thus displayed three times—(1) in the camp; (2) on elephants during the advance; (3) close to each chief in action. It is said in the *Alamgír-námah* that the Cheros met this advance of Dáúd's on the 16th by issuing from the fort, and taking up an entrenched position about one mile from the imperial camp. This is represented in the picture by a straight wall across the picture with three *burjs*, or bastions, on which, as well as on the curtain-works, guns are mounted, pointed at the camp of the imperialists. It is said that hostilities were suspended until an answer should be received from Pratáp, the Chero Rájá, to the demands of the Emperor, viz., that he must not only submit, but become a Muhammadan; but Tahawar Khán could not be restrained, and without orders from Dáúd, he made an attack from the right on the enemies' left. This is shown in the picture.

"In front are the three divisions of the army, the *sardárs* leading, *all on foot;* next come the horses of the *sardárs*, enormous brutes, each followed by an elephant on which is borne the *sardár's* banner, and then the led horses of the imperialist cavalry. The third line of banners with the advance indicates the position of the different chiefs in the action; and their names are also given. Dáúd Khán is in the centre. He is dressed all in white, except his stockings, which are red, and he wears a white turban and tunic and white shoes. But the group of Dáúd and his immediate attendants is drawn on a bit of cloth inserted as a patch in the great picture, and it is said that this portion of the original drawing met with some accident necessitating a reproduction. However, Dáúd's two nephews are represented near him similarly attired and armed. He and one of his nephews have bows, arrows, shield, and sword. Another has a matchlock; and one of Dáúd's attendants holds his master's firelock as if offering it to him, whilst the general is drawing a bow, evidently not at a venture, as he looks stern and determined, and the enemy are close to him. The imperialist forces show a decided mixture of races. Some are of dark-brown complexion, some of a lighter brown,

and others fair as Europeans. The costumes also vary. There are regulars and irregulars in the imperial army, both bowmen and matchlock-bearers, the regulars distinguished by turbans with stiff feathers, dresses of some figured cloth, and shoes high over the instep, with long thongs behind to assist in pulling them on. The men are all bearded. The bows of the imperialist chiefs are all of the Cupid or Apollo shape, hip-curved; whilst not a few, both of the enemy and of the dark-skinned portion of Dáúd's army, are of a simple curve, such as we still see in the hands of Kols, Gonds, and other hill tribes. The dark imperialists are as insufficiently clad as the majority of the Cheros are represented to be; and their martial ardour is roused by drums precisely similar to those now used by the Kols, whilst the regulars of the imperial army are inspired by the 'trumpets' pealing note,' the trumpets as big as the men who blow them. They have also kettledrums and trumpeters on camels. There is no reason why Kols should not be found in the ranks of Dáúd's army, as the Kols had on previous occasions helped the Emperor; and in one obscure corner of the picture outside the entrenched camp of Dáúd we find 'the *zamíndár-i-kán-i-almás*,' 'the Lord of the diamond-mine;' and who could he be if not the Nágbansí Rájá? In the portion of the picture representing the attack, the Rájá of the diamond-mines appears valiantly leading the troops on the extreme right of the line. This is a position assigned by the Muhammadan historian to Shaikh Safí, whom I have not been able to identify among the belligerents.

"On the left, but somewhat in front of the imperial camp, a range of hills is represented, from which the Chero camp behind their entrenchment is commanded. On the centre of these hills four great guns are mounted, and a note indicates that they were placed by Dáúd to enfilade the enemy. This is just as it is described by the Muhammadan historian. The losses of the imperialists were chiefly due to the fact that the outworks of the enemy were higher than those of Dáúd, whose camp was at the foot of the hill. Dáúd therefore occupied a hill which overlooked the position of the enemy, and erected a battery which caused much damage.

"On the 27th of the same month, the enemy left their position and withdrew to the banks of the river near the fort. It is clear from the narrative as it proceeds that they took up an entrenched position in a range of hills running parallel with the river, which passes through them. This is shown. A conventional drawing of

hills going right across the picture, and dividing it into two equal parts, exhibits the second position of the Cheros, and represents them engaged with the imperialists. The Cheros are not shown in their first position, as the space behind their entrenchment was reserved by the artist for a good pictorial display of the imperialists advancing on the second position, after the Cheros had abandoned the first. The action represented is where 'Dáúd attacked the trenches which the Rájá had erected along the river;' but judging from the picture (and from the ground, which I have been over), 'fortified position' should be substituted for 'trenches'—a line of hills with breastworks in different places and passes barricaded. (I have had myself to attack precisely similar positions when engaged against the very same people.)

"I find from the picture, as from the annals, that Shaikh Tátár and Shaikh Ahmad, sons of Dáúd's brother, with their contingents, several imperial *mansabdárs*, and the sons of Rájá Bihrúz, attacked on the left, and forced the passes held by the enemy. The *élite* of this portion of the imperial army, a body of handsomely dressed matchlockmen, have seized a hill on the extreme left, which enfiladed one of the passes, and they are represented as keeping up a brisk fire on the disordered Cheros, whom they had dislodged. The whole position is, indeed, shown as captured by the imperialists; and from this part of the ground their arrows and matchlock-balls are dealing destruction on their enemies, who are seen some without heads, others fleeing with arrows in their backs, but some still holding the ground between the hills and the river.

"The annals tell us that Dáúd was induced to remain in the position he had gained, leisurely to make arrangements for the protraction of the siege, but he could not restrain his men; 'they pursued the enemy, crossed the river after them, and commenced an attack on the fortifications.' Before morning he had completed the conquest of the fort, and the Chero Rájá fled to the hills behind it. The river is represented by a band of green right across the picture (blue in my sketch), with queer-shaped obstructions of a darker colour; but as we are informed by the notes in Persian that the first is a *river* (the Ourangá), and that the second represents rocks, it answers as well as if it had been most artistically delineated. The Chero Rájá's fort, drawn rather elaborately *in plan*, comes next, and the picture ends in a map of great wooded hills, into which the Rájá retreated. The Chero host is for the most part portrayed

holding its ground, but in sad plight between the hills from which they had been dislodged and the river. The Chero cavalry were evidently posted in reserve in the bed of the river, a very respectable body, as well mounted as their foes: but many are galloping up and down the sands of the river in a purposeless manner, some badly wounded. They are all with one or two exceptions of fair complexion and dressed as Hindustánís; and amongst the Chero foot-soldiers there are a number of fair-complexioned and well-dressed men, showing that in those days, as at present, there was a considerable sprinkling of Aryans amongst the Palámau population. But the majority are black with only a loin cloth, and bare heads and bare feet, bows as above described with only one curve and plenty of arrows, besides which some have spears, and some swords and shields. The proportion of matchlock-men to bowmen is small, but even the imperialists are shown to have more of the latter than of the former. The artist has not altogether failed to grasp some of the ethnical characteristics of the Palámau aborigines. The black men have all receding chins and foreheads, and are probably Kharwárs. Dáúd's flank movement was apparently the only piece of strategy employed. Strong as he was in cavalry, he might have easily cut off the retreat of the Rájá to the hills beyond the fort; but I daresay his intelligence department was at fault. It is noticeable that the imperialists did not advance their guns when attacking the second position; they were left at their place and no field-artillery was employed."

From this time the annals of Palámau are blank up to 1722, when Rájá Ranjit Rái was murdered, and Jaikissan Rái, the head of a faction called the Bábuán, who were descended from the younger son of a former Rájá, was placed upon the *gadí*. A few years afterwards, Jaikissan was shot in a skirmish with some of Ranjit Rái's relatives on the Chetma Pass near Satbarwá, and Chitrajit Rái was made Rájá. Jaikissan's family fled to Megrá in Behar, and took refuge with one Udwant Rám, a *kánúngo*, who, in 1770, took Gopál Rái, grandson of the murdered Rájá, to Patná, and presented him to Captain Camac, the Government Agent, as the rightful heir to the Palámaú Raj. Captain Camac promised the assistance of the British Government; and it happened that about the same time Jinnáth Sinh, *diwán* under Chitrajit Rái, had declared before Mr Bellam at Aurangábád that the Mahárájá of Palámau would neither become a vassal of the British, nor grant supplies to any British

troops that might pass through his country. A force, therefore, marched into Palámau in 1772, under Captain Camac, and drove the Mahárájá's troops under Jinnáth Sinh back into the Satbarwá forts, which occupy a strong position on a bend of the Aurangá river. Here there appeared likely to be a difficulty, as the light guns which had accompanied the British troops could make no impression on the solid stone of the forts. Udwant Rái, however, pointed out a certain spot in one of the walls of the old fort, which, though apparently as strong as the rest, consisted of mud merely faced with stone, and had been purposely left in this state by Medni Rái, so as to afford him a means of retaking the fort in case he should be driven out of it. At this point a breach was soon effected, the fort was taken by storm, while Chitrajit Rái fled to Rámgarh, and the *diwán* with his family to Sargújá. Captain Camac then granted a *sanad* for five years to Gopál Rái, conjointly with his cousins, Gajráj and Seogand Rái, and left the country. Palámau thus became part of the District of Rámgarh. After a year or two, the sons of the late *diwán* came back from Sargújá, and being reinstated in the *diwánship*, procured the murder of the *kánungo*, Udwant Rám, at the palace of Sháhpur near Daltonganj. The relatives of the murdered man applied for help to a small detachment of British troops which was quartered at Lesliegani. Gopál Rái was taken prisoner by Lieutenant Remyss, sent for trial to Chatrá, the administrative head-quarters of Rámgarh District, and sentenced to imprisonment at Patná, where he died in 1784. In that year died also Bassant Rái, who had succeeded to the *gadi* when Gopál was imprisoned; and Churáman Rái, a minor, thus became Mahárájá. By 1813, Churáman had become insolvent, and Palámau was, therefore, sold for arrears of revenue, and bought in by Government for the amount due. Three years afterwards, in 1816, the estate was given to Rájá Fatih Náráyan Sinh of Deo in Gayá, and his son, Ghanesám Sinh, as a reward for services rendered in quelling revolts of the Cheros and Kharwárs. The Rájá's management, however, was so oppressive as to rouse the people into open rebellion; and in 1818 Government revoked the deed of grant, allowing the Rájá a remission of Rs. 3000 a year from the revenue of his Behar estates by way of compensation. Under Government rule Palámau remained quiet up to 1832, when the Kol rebellion was followed by a rising of the Cheros and Kharwárs. This was soon put down, and there were no further troubles until the Mutiny of 1857, when the Khar-

wárs, headed by the Bhogtás, rose against their Rájput landlords; and the mutineers of the Rámgarh Battalion, taking refuge in Palámau, made common cause with Nilámbar and Pitámbar Sinh, two malcontent landholders. The 26th Madras Native Infantry, and a portion of the Rámgarh Battalion which had remained loyal, defeated the insurgents at the Satbarwá forts. Nilámbar and Pitámbar Sinh were taken prisoners, and hanged as rebels.

Revenue and Expenditure.—The following statements, taken from the balance sheets of the District, which are printed at length on the two next pages, illustrate the growth of the revenue and expenditure since 1858–59. Owing to the destruction of the records at the time of the Mutiny, no returns are available for any previous date.

In 1858–59, the revenue of the District, which then contained the same area as at present, with the exception of the Fiscal Divisions of Belaunjeh and Japlá, which have been recently transferred from Gayá, amounted to £13,681, almost entirely derived from land revenue and excise; and the expenditure on civil administration to £15,440, or nearly £2000 more than the revenue. This excess of expenditure over revenue was, however, quite abnormal, being caused by payments (Nos. 11 and 12) made on account of the Mutiny. In 1870–71, the net revenue amounted to £29,900, and the total expenditure to £22,563. The expansion of revenue here shown is due for the most part to the resettlement of Palámau at enhanced rates, the imposition of the Income Tax, and the increased sale of stamps.

The Land Tax forms a smaller proportion of the revenue of the District than is usually the case elsewhere. Thus, in 1858–59, the land revenue of Lohárdagá District amounted to £4474, 10s. 2d, or about one-third of the entire revenue of the District. By 1870–71 it had risen, in consequence of the new Settlement of Palámau, to £7067, 5s. but formed a still smaller proportion of the entire District revenue.

Protection to Person and Property has much increased of late years. In 1860–61, there were five Magisterial and five Civil and Revenue Courts in the District; in 1870–71, there were nine Magisterial, and the same number of Civil and Revenue Courts. There were three Covenanted European officers at work in the District in 1860–61, and two in 1870–71.

Rent Suits.—The number of rent cases instituted under the pro-

[Sentence continued on page 473.]

Balance Sheet of Lohárdagá District for the Year 1858–59.

REVENUE.	£	s.	d.
1. Land Revenue	4,474	0	0
2. Revenue from *Koh Kalh* (silk cocoon or catechu)	134	0	0
3. Revenue from Confiscated Estates	1,101	0	0
4. Political	715	0	0
5. Excise	5,375	0	0
6. Process Fees	1	0	0
7. Stamps	1,251	0	0
8. Civil Court *Amlu's* Fees	4	0	0
9. Pound Collections	10	0	0
10. *Chaukhidárí* Tax	11	0	0
11. Fees for Searching Records	3	0	0
12. Proceeds from Sale of Mutineers' Property	225	0	0
13. Savings from Establishments of the Revenue, Civil, and Criminal Departments	135	0	0
14. Proceeds from Sale of Unclaimed Property	31	0	0
15. Fines	194	0	0
16. Premium on Bills	17	0	0
17. Jail	10	0	0
Total,	13,681	0	0

EXPENDITURE.	£	s.	d.
1. Revenue	3,216	0	0
2. *Abkárí*	282	0	0
3. Civil	1,427	0	0
4. Criminal	5,303	0	0
5. Political	563	0	0
6. Discount on Sale of Stamps	36	0	0
7. Pensions	238	0	0
8. Public Works	83	0	0
9. Interest on Promissory Notes	16	0	0
10. Collection Charges of Confiscated Estates	162	0	0
11. Compensation paid to Government Servants during the Mutiny	2,090	0	0
12. Salary of the Sepoys of the Rájá of Deo, who came to assist the Government during the Mutiny	1,969	0	0
Total,	15,449	0	0

In converting the rupees, the nearest pound sterling has been taken, and the odd shillings have been omitted.

BALANCE SHEET OF LOHÁRDAGÁ DISTRICT FOR THE YEAR 1870-71.

REVENUE.

	£	s.	d.
1. Land Revenue	7,067	0	0
2. Fees under Record Rules	8	0	0
3. Fines	660	0	0
4. Tax on *Kod Kath*, or right to collect silk and catechu	140	0	0
5. *Abkári*	6,005	0	0
6. Stamps	4,502	0	0
7. Income-Tax	8,402	0	0
8. Peons' Fees (Revenue and Civil)	563	0	0
9. One per Cent. Road Fund	1	0	0
10. Rate from Wards' and Attached Estates	339	0	0
11. Miscellaneous Revenue Department	5	0	0
12. Proceeds of Unclaimed and Intestate Property	45	0	0
13. Civil Court *Amín's* Fees	26	0	0
14. Stamp Penalties by Judicial Officer	36	0	0
15. Fees for Searching Records	8	0	0
16. *Chaukídárí* Fund	316	0	0
17. Town Fund	727	0	0
18. *Zamíndárí dák* Fund	369	0	0
19. Pound Fund	228	0	0
20. Proceeds of Jail Manufacture	170	0	0
21. Registration Fees	282	0	0
22. Miscellaneous Criminal Receipts	1	0	0
Total,	29,900	0	0

EXPENDITURE.

	£	s.	d.
1. Revenue	4,062	0	0
2. *Abkárí*	501	0	0
3. Stamps	115	0	0
4. Income-Tax	749	0	0
5. Peons' Fees (Revenue and Civil)	574	0	0
6. Rate from Wards' and Attached Estates	72	0	0
7. Civil Department	1,109	0	0
8. Criminal Department (including £1062 paid as rewards for killing wild animals)	1,393	0	0
9. *Chaukídárí* Fund	230	0	0
10. Town Fund	679	0	0
11. *Zamíndárí dák*	369	0	0
12. Pound Fund	88	0	0
13. Jail	1,316	0	0
14. Registration	196	0	0
15. Amalgamated District Road Fund	1,000	0	0
16. Police	8,187	0	0
17. Special Commissioners, C. N. Tenure Act	1,504	0	0
18. Fund for the Improvement of Government Estates	12	0	0
19. Pensions	373	0	0
20. Interest on Government Promissory Notes	34	0	0
Total,	22,563	0	0

In converting the rupees, the nearest pound sterling has been taken, and the odd shillings have been omitted.

[Sentence continued from page 470.]

visions of Act X. of 1859—the Rent Law of Bengal—are returned by the Deputy-Commissioner as follow:—In 1861–62, 71 original suits were instituted, besides 242 miscellaneous applications; in 1862–63, there were 79 original suits, besides 150 miscellaneous applications; in 1866–67, the number of original suits instituted amounted to 444, and of miscellaneous applications to 1067; in 1868–69, the number of original suits was 214, and of miscellaneous applications 1354.

Police Statistics.—For police purposes, the District of Lohárdagá is divided into twenty-one Police Circles (*thánás*), viz:—(1) Bálumat; (2) Barwá; (3) Bassiá; (4) Birú; (5) Choriá; (6) Kurumbe; (7) Lodhmá; (8) Lohárdagá; (9) Pálkót; (10) Ránchí; (11) Silli; (12) Tamár; and (13) Torpá, in the Sadr Subdivision; (14) Bareswar; (15) Chattarpur; (16) Daltonganj; (17) Garwá; (18) Munká; (19) Majhiwán; (20) Patun; and (21) Rámkunda in the Palámau Subdivision. The machinery for protecting person and property consists of the Regular or District Police, the Village Watch or rural force, and a Municipal Police for the municipalities.

The Regular Police consisted of the following strength at the end of 1872:—Two superior European officers, consisting of a District Superintendent and an Assistant-Superintendent, receiving a salary of Rs. 1100 a month, or £1320 a year; 5 subordinate officers, on a salary of upwards of Rs. 100 a month, or £120 a year, and 90 officers on less than Rs. 100 a month, or £120 a year, maintained at a total cost of Rs. 3125 a month, or £3750 a year, equal to an average pay of Rs. 32-14-4 a month, or £39, 9s. 9d. a year, for each subordinate officer; and 412 foot police constables, maintained at a total cost of Rs. 2537 a month, or £3044, 8s. a year, equal to an average pay of Rs. 6-2-6 a month, or £7, 7s. 6d. a year for each man. The other expenses connected with the Regular Police are, an average of Rs. 154-2-8 a month, or £185 a year, as travelling expenses of the superior officers; Rs. 168-14-8 a month, or £202, 14s. a year, for pay and travelling allowances of their office establishments; and Rs. 825-1-4 a month, or £990, 2s. a year, for contingencies and all other expenses; bringing up the total cost of the Regular Police of Lohárdagá District in 1872 to Rs. 7919 a month, or a total for the year of £9502, 16s. The total strength of the force was 509 men of all ranks. The present area of the District is 12,044 square miles; and the population, as ascertained by the Census Report of

1872, is 1,237,123 souls. According to these figures, there is on policeman to every 23·66 square miles of the District area; and on to every 2430 of the population. The annual cost of maintenanc of the force is equal to Rs. 7-14-2, or 15s. 9¼d. per square mile area, and Rs. 0-1-2, or 1¾d. per head of the population.

THE MUNICIPAL POLICE is a force maintained in the towns an large villages. It consisted at the end of 1872 of one native office and 59 men, maintained at a total cost of Rs. 270-13-4 a month, o £325 a year, defrayed by means of rates levied from the house holders and shopkeepers carrying on business within municip limits. As compared with the municipal area, the proportion o officers and men is 41 to every square mile; as compared with th population of the town of Ránchí, the proportion is one policeman t every 201 persons. The cost of maintaining this force, as compare with the municipal population, amounted in 1872 to Rs. 0-4-3, o 6½d. per head.

THE VILLAGE WATCH or rural Police numbered 2332 in 1872 maintained either by the *zamíndárs* or by service lands held rent-free at an estimated total cost of Rs. 30,247, or £3024, 14s. per annum Compared with the area and population, there is one village watchman *chaukidár* to every 5·16 square miles of the District area, or one t every 531 of the population; maintained at an estimated cost o Rs. 2-8-2, or 5s. 0¼d. per square mile of area, and four *pies* or ½d. pe head of the population. Each village watchman has on an average charge of 52 houses; and receives an average pay in money or lands of Rs. 1-0-9 a month, or £1, 5s. 1½d. a year.

Including, therefore, the Regular Police, the Municipal Police, and the Village Watch, the machinery for protecting person and property in Lohárdagá District consisted at the end of 1872 of a total force o 2489 officers and men; equal to one man to every 4·84 of a square mile as compared with the District area, or one man to every 497 souls as compared with the population. The estimated aggregate cost of maintaining this force, both Government and local, and including the value of the rent-free lands held by the *chaukidárs*, amounted in 1872 to Rs. 10,710-6-8 a month, or a total for the year £12,852, 10s., equal to a charge of Rs. 10-10-8, or £1, 1s. 4d. per square mile of the District area, and Rs. 0-1-7, or nearly 2d. per head of the population.

CRIMINAL STATISTICS.—During the year 1871, the police conducted 777 "cognisable" cases, the percentage of final convictions

men brought to trial being 57·6 per cent.; and 863 "non-cognisable" cases, the proportion of final convictions to prisoners brought trial being 46·7 per cent. The total number of both cognisable nd non-cognisable cases in 1871 was 1640, the percentage of final onvictions to prisoners brought to trial being 50·8 per cent. uring 1872, the year which has been uniformly adopted in other tatistical Accounts, 1009 "cognisable" cases were reported to the olice, of which 144 were discovered to be false, and 119 were not quired into, under section 137 of the Criminal Procedure Code. onvictions were obtained in 455 cases, or 61 per cent. of the "true" ses; the number of persons actually brought to trial was 1106, of hom 676 or 61·12 per cent. were finally convicted. In the same ar the number of "non-cognisable" cases was 1081; the number of rsons who actually appeared before the Court was 1091, of whom 52 or 50·60 per cent. were finally convicted. The total number, erefore, of both "cognisable" and "non-cognisable" cases in 1872 as 2090; the total number of persons convicted of an offence nder either of these heads was 1228 or 1 per cent. of the total istrict population.

The following are the principal cases of serious crime which ccurred in Lohárdagá District during the years 1870 and 1871. he prevalence of murders, gang robberies, and similar crimes of iolence has always been a peculiar feature of the District. No less han seventeen cases of murder occurred during 1870, the victims in wo instances being women, who were put to death as reputed itches. But with the exception of these particular crimes, the mur- ers reported were proportionately more numerous among the civil- sed classes; nor was there anything to justify the assumption, that he frequency of the crime of murder was due to the savage nature r exceptionally low moral standard of the aboriginal races, who nake up the bulk of the population. In *dákáitis* there was a sensible ecrease; and almost all the eight cases inquired into in 1870 were ttacks made on travellers in different hill passes or on jungle roads. The Commissioner, however, writes that "the results in the *dákáiti* ases are very unsatisfactory. Out of 80 persons concerned in eight ases, only 15 were arrested; and of the 31 persons brought to rial, only one was convicted." The Deputy-Commissioner explains hat this is mainly due to the facilities for escape afforded by the size f the District, and the time which the police necessarily take in rriving on the spot; while the injured parties are usually strangers,

and either unable to keep the police in the work of detection, disinclined to do so for fear of being detained on their journe Moreover, as the bulk of the property stolen consists either of gra or money, identification is impossible, and the police have but lit evidence to guide them in their inquiry. In 1871, the number murder cases fell from seventeen to seven, one only being connect with the belief in witchcraft. Another case was left pending at t end of the year, in which a woman had been beaten to death having caused by sorcery the death of a child of one of the villa headmen. Only three cases of *dákáití* were returned in 1871, against eight reported in the previous year. All were attacks travellers passing through wild parts of the District. In one cas some traders were set upon by a party of hill Korwás, in a pass lea ing from Palámau into the Tributary State of Sargújá. The polic aided by the villagers and the Sargújá authorities, followed t *dákáits* into the hills, and arrested four men whom the traders pr fessed to be able to recognise. But no property was recovered, a the men were released as the recognition was considered doubtfu Three bigamy cases were decided during the year; in one of whic the parties were Rajwárs, and the defence set up was that the hu band had formally divorced his wife while yet an infant, by makin her over to her father, having at the same time torn a leaf and broke a straw to symbolize the dissolution of the marriage.

JAIL STATISTICS.—In 1870, there were two jails in Lohárdag viz., the District jail at Ránchí, the Station of the Head-quarte Subdivision, and the Subdivisional lock-up at Palámau. The fo lowing figures are compiled from a return specially prepared the Inspector-General's Office, showing the jail population of th District, cost of maintenance, value of jail labour, &c., for the yea 1857–58, 1860–61, and 1870–71; and from the Administratio Report of the Inspector-General of Jails for 1870 and 1872. Th caution which has been prefixed to the jail statistics of Hazáribágh regarding the inaccuracy of the figures for the early years, appli also to this District.

In 1857–58, the first year for which materials are available, th daily average number of criminal, under-trial, and civil prisoners i the Lohárdagá jail amounted to 148; the total number of admission during the year being 1010. The total discharges from all cause were as follow:—Transferred, 64; released, 553; escaped, 2; died 16; executed, 75: total, 710. In 1860–61, the jail returns show

ily average of 333 prisoners; the number admitted during the ar being 824. The discharges were—transferred, 215; released, 2; escaped, 12; died, 91; executed, 4: total, 964. In 1870, the ily average number of prisoners was 265; the number admitted ring the year being—direct, 775, and by transfer, 88; total, 863. he total number discharged from all causes was as follows:—ansferred, 98; released, 808; escaped, 4; died, 18; executed, 2: tal discharged, 930. For 1872, the jail figures were as fol-w:—Average daily number of prisoners, 187·25; total number of soners admitted during the year, 619. The discharges were—ansferred, 173; released, 422; escaped, 5; executed, 2; died, 4: tal, 606.

The sanitary condition of the Lohárdagá jail has much improved late years. In 1857–58, the percentage of admissions into the il hospital amounted to 232·43 per cent., and the deaths to 16, or 81 per cent., of the average jail population. In 1860–61, the rcentage of admissions into hospital amounted to 189·78 per cent., nd the number of deaths increased to 91, or no less than 27·32 er cent., of the average number of prisoners. In 1870, the propor-on of admissions into hospital amounted to 120·37 per cent., but the ortality had fallen to 18, or 6·79 per cent., of the mean jail opulation; although, as the Inspector-General remarks in his eport for that year, cholera of an epidemic type had caused ine deaths in the jail, seven of which occurred amongst convicted risoners. But for this exceptional mortality, the proportion of tal cases would have appeared considerably less than in the receding year. In 1872, the death-rate had further decreased o 1·97 per cent.

Cost of Jail Maintenance.—The average cost of maintenance er prisoner in the Lohárdagá jail and lock-up, including rations, ospital charges, clothing, contingencies, and all other charges ex-ept the cost of the prison police guard, is returned as follows:—n 1857–58, it was Rs.60-12-7 (£6, 1s. 7d.) per head; in 1860–61, s.42-13-6 (£4, 5s. 8d.) per head; and in 1870, Rs.46-15-4 (£4, 3s. 11d.) per head. In the latter year the cost of police guard mounted to Rs.8-1-6 per prisoner, making a total cost to Govern-nent of Rs.55-0-10 (£5, 10s. 1d.) per head. Materials are not vailable for showing the separate cost of the jail police guard in ears previous to 1870. The Inspector-General, in his report for 870, returns the total expenditure incurred in the maintenance

of convicted prisoners in the jail and lock-up of Lohárdagá District, including police guard, but exclusive of the cost of building new jails and additions, alterations, and repairs, at £1169, 14. Excluding cost of police guard, which is included in the general police budget of the District, the cost of the jails in 187 amounted to £855, 2s. In 1872, the cost of the jails, including police guard, amounted to £1364, 11s.; and excluding police guard, to £1040, 13s.

JAIL MANUFACTURES have been carried on at Lohárdagá since 1857, but only a small proportion of the expense of maintaining the criminal population is returned to the Government in the shape of profit from this source. Returns are not available for 1857–58. In 1860–61, the value of prison manufactures amounted to £10 12s. 4d., the total charges being £56, 8s. 8d., leaving a profit of £47, 3s. 8d.; average earnings of each prisoner employed in manufactures, 11s. 3¼d. In 1870, the total credits amounted to £260, 2s. 8d., and the total debits to £229, 2s. 4d.; excess of credits over debits, or net profit, £31, 0s. 4d.; average earnings of each prisoner employed in manufactures, 7s. 2½d. In 1872, the total credits arising from jail manufactures amounted to £58 7s. 7d., and the debits to £525, 5s. 4d.; excess of credits over debits, £55, 2s. 3d.; average estimated earnings during the year of each prisoner employed on manufactures, 5s. 7d. The average number of prisoners on prison manufactures in Lohárdagá jail in 1872 was 88·97, made up as follows:—Gunny weaving, 1·60; gardening, 34·36; manufacturing cloth, 9; bricklaying, &c., 6·30; bamboo, rattan, and reed works, 4·80; oil pressing, 2·10; flour grinding, 1·80; stone breaking, 0·18; manufacturing carpets, &c., 1·60; carpentering, 5·30; manufacturing blankets, 14; iron work, 2·80; grinding pulses, 1·10; tailoring, 1·20; pottery, 0·80; miscellaneous works, 2·03: total, 88·97.

EDUCATIONAL STATISTICS.—The Reports of the Director of Public Instruction show that in 1856–57, and again in 1860–61, there was only one Government school in Lohárdagá. By 1870–71 the number of Government and aided schools had increased to 7; by 1871–72 the creation of a number of primary schools had swelled the total to 22; and in 1872–73, the entire number of Government and aided schools in the District was 178. In 1856–57 the number of pupils was 67; for 1860–61 no return is available; in 1870–71 the number was 620; in 1871–72 it rose to 986; and in 1872–73 to 4553.

Besides these, there were in 1871-72 4 private unaided schools attended by 73 pupils, and in 1872-73 57 unaided schools attended by 580 pupils. According to the area of the District as returned by the Surveyor-General, and the population as ascertained by the Census of 1872, there was in 1871-72 one school to every 463·23 square miles, and to every 47,581 of the population; the number of pupils at school being 1 to every 1168 of the population. Again, comparing these figures with the male population, and deducting the aided girls' school, there was 1 school to every 24,881 males, and 1 scholar to every 277 boys under twelve years of age.

The most satisfactory evidence of the increased interest felt by the people in the cause of education is the proportion paid by them for the support of the schools. In 1870-71, the amount of private contributions and fees towards the Government and aided schools in Lohárdagá District only amounted to £265, 13s. 2d. By 1871-72 it had risen to £1092, 18s. 11d.; and in 1872-73, it was £884, 16s. 4d. The total cost of education in Government and aided schools in Lohárdagá District in 1872-73 amounted to £1621, 4s. 5d., the average cost being Rs. 3-5-5, or 6s. 8d. for each pupil. Of this total, the Government contribution was £737, 12s. 4d., or 45 per cent.

The following tables exhibit the statistics of the Government aided and unaided schools in Lohárdagá; Table I. for 1856-57 and 1870-71, and Table II. for 1871-72 and 1872-73:—

RETURN OF GOVERNMENT AND AIDED SCHOOLS IN LOHÁRDAGÁ DISTRICT FOR THE YEARS 1856-57 AND 1870-71. (TABLE I.)

CLASSIFICATION OF SCHOOLS.	Number of Schools.		Number of Pupils.								Cost to Government.		Amount realised by Fees and Private Contributions.	Total Cost.	
			Hindus.		Muhammadans.		Others.		Total.						
	1856-57	1870-71	1856-57	1870-71	1856-57	1870-71	1856-57	1870-71	1856-57	1870-71	1856-57	1870-71	1870-71	1856-57	1870-71
											£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.
Government English Schools	1	1	23	85	31	14	13	13	67	112	174 18 6	295 3 0	84 5 0	174 18 6	379 8 0
Government Vernacular Schools	...	3	...	162	...	3	...	18	...	183	...	75 16 8	8 16 8	...	84 13 4
Aided English Schools	...	2	...	36	...	5	...	203	...	244	...	90 12 6	172 11 6	...	263 3 6
Do. Vernacular Schools	...	1	...	47	...	29	...	5	...	81	...	...	...	...	...
Total	1	7	23	330	31	51	13	239	67	620	174 18 6	461 11 8	265 13 2	174 18 6	727 4 10

Comparative Statement showing the Progress of Primary Education in Lohárdagá District for the two Years 1871–72 and 1872–73. (Table II.)

Classification of Schools.	Number of Schools.		Number of Pupils.		Receipts. From Government.		From Local Funds. Fees and Fines.		From Local Funds. Other Local Sources.		Total.		Expenditure.	
	1871–72.	1872–73.	1871–72.	1872–73.	1871–72.	1872–73.	1871–72.	1872–73.	1871–72.	1872–73.	1871–72.	1872–73.	1871–72.	1872–73.
					£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.	£ s. d.
Government Higher Schools,	1	1	138	125	393 7 6	250 11 0	79 11 3	106 18 9	...	10 0 0	382 18 9	367 9 9	382 18 9	307 9 9
Middle Schools—														
Government Vernacular,	3	3	125	148	87 1 0	89 18 6	10 1 4	7 15 6	...	...	97 2 4	97 14 0	97 2 4	97 14 0
Aided { English,	3	1	406	41	100 12 0	27 10 0	29 16 9	26 17 10	728 16 6	11 10 2	859 5 3	65 18 0	859 5 3	65 18 0
Aided { Vernacular,	1	2	70	317	18 0 0	78 12 0	8 15 9	8 17 2	11 13 2	227 2 10	38 8 11	314 12 0	38 8 11	313 8 0
Unaided,	...	1	...	62	...	...	...	...	...	...	...	...	...	...
Total,	7	7	607	568	205 13 0	196 0 6	48 13 10	43 10 6	740 9 8	238 13 0	994 16 6	478 4 0	994 16 6	477 0 0
Primary Schools—														
Aided,	13	170	221	3748	69 4 2	231 0 7	0 18 2	5 8 10	53 6 0	52 1 7	123 8 4	288 11 0	123 8 5	288 11 0
Unaided,	3	55	62	504	...	...	...	...	4 16 0	...	4 16 0	...	4 16 0	...
Total,	16	225	283	4252	69 4 2	231 0 7	0 18 2	5 8 10	58 2 0	52 1 7	128 4 4	288 11 0	128 4 5	288 11 0
Aided Normal School,	1	1	20	174	5 0 0	60 0 0	...	...	170 0 0	428 3 8	175 0 0	488 3 8	175 0 0	488 3 8
Unaided Girls' School,	1	1	12	14	...	...	...	...	44 4 7	...	44 4 7	...	36 6 0	...
Total of Government and Aided Schools,	22	198	986	4553	583 4 8	737 12 1	129 3 3	155 18 1	963 15 8	728 18 3	1676 3 7	1622 8 5	1676 3 8	1621 4 5
Total of Unaided Schools,	4	57	74	580	...	...	...	...	49 0 7	...	49 0 7	...	42 6 7	...

SIR GEORGE CAMPBELL'S EDUCATIONAL REFORMS.—The remarkable increase that the foregoing tables disclose in the number of schools in 1872-73 was mainly caused by the establishment of new *pátisálás*, or village schools, under the orders of the 30th September and 25th October 1872. Throughout the District, however, and especially in the Subdivision of Palámau, a considerable amount of passive resistance was offered to this measure. Free education was so strange an idea to the people that a suggestion, commonly made by the landholders and grain merchants, found ready belief, to the effect that Government was educating children with the ulterior design of deporting them to Calcutta.

POSTAL STATISTICS.—A considerable increase has taken place of late years in the use of the Post Office by the people. Between 1861-62 and 1870-71, the number of letters received at the Post Offices in Lóhárdagá District has increased by nearly three fold, having risen from 34,543 in 1861-62, to 47,773 in 1865-66, and to 94,764 in 1870-71. The number of letters despatched from the District Post Offices increased from 33,637 in 1860-61 to 45,315 in 1865-66; and the total number of letters, newspapers, parcels, and books, from 34,764 in 1860-61 to 46,771 in 1865-66. The figures under this head for 1870-71 are not available.

POSTAL STATISTICS OF THE DISTRICT OF LÓHÁRDAGÁ FOR THE YEARS 1861-62, 1865-66, AND 1870-71.

	1861-62.		1865-66.		1870-71.	
	Received.	Despatched.	Received.	Despatched.	Received.	Despatched.
Private letters,	25,309	24,884	36,700	33,512	94,764	Information not available.
Service letters,	9,234	8,753	11,073	11,803		
Total letters,	34,543	33,637	47,773	45,315	94,764	
Newspapers,	6,032	796	8,428	843	10,732	
Parcels,	828	241	1,225	432	1,062	
Books,	749	90	1,604	181	2,784	
Total,	42,152	34,764	58,430	46,771	109,342	...
	£ s. d.		£ s. d.		£ s. d.	
Receipts from cash collections (exclusive of those from sale of postage stamps),	143 0 6		201 17 0		429 1 0	
Total charges,	152 12 0		219 11 4		523 8 2	

Administrative Divisions.—For administrative purposes Lohárdagá District is divided into the following two Subdivisions:—(1) The Sadr or Head-quarters Subdivision; and (2) Palámau Subdivision. The population Statistics are compiled from Statements 1A and 1B, Appendix to the Census Report of 1872; the Administrative figures are derived from the special report furnished by the Deputy Commissioner, and refer to the year 1870–71.

(1) The Sadr or principal Head-quarters Subdivision, with the head-quarters of the District at Ránchí, contains an area of 7784 square miles, with 3819 villages, 172,124 houses, and a total population of 870,607 souls, of whom 423,480, or 48·6 per cent., are Hindus; 26,095, or 3·0 per cent., are Muhammadans; 12,779, or 1·5 per cent., are Christians; 408,250, or 46·9 per cent., are of other religions not separately classified. The proportion of males in the total population is 50·2 per cent.; average number of persons per square mile, 112; average number of villages per square mile, 0·49; average number of persons per village, 228; average number of houses per square mile, 22; average number of persons per house, 5·1. The Subdivision consists of the Police Circles of (1) Bálumat, (2) Barwá, (3) Bassiá, (4) Birú, (5) Choriá, (6) Koiambe, (7) Lodhmá, (8) Lohárdagá, (9) Pálkót, (10) Ránchí, (11) Silli, (12) Tamár, and (13) Torpá. In 1870–71, it contained ten Magisterial Courts, a Regular Police Force of 374 men, and a Village Watch or rural police of 1772 men; the total separate cost of administration amounted to £12,291. Ránchí has been the Head-quarters Subdivision since January 1834.

(2) Palámau Subdivision was formed in August 1853. It contains an area of 4260 square miles, with 2667 villages, 68,719 houses, and a total population of 366,519 souls, of whom 318,472, or 86·9 per cent., are Hindus; 32,116, or 8·8 per cent., are Muhammadans; 2 are Christians; and 15,929, or 4·3 per cent., of other religions. The proportion of males in the total population is 50·4 per cent.; average number of persons per square mile, 86; average number of villages per square mile, 0·62; average number of persons per village, 137; average number of houses per square mile, 16; average number of persons per house, 5·3. The Subdivision consists of the Police Circles of (1) Bareswar, (2) Chhattarpur, (3) Daltonganj, (4) Garwá (5) Manká, (6) Majhiwán, (7) Patun, and (8) Ránkunda. In 1870–71 it contained seven Magisterial Courts, a Regular Police Force of 148

men, and a Village Watch of 154 men; the total separate cost of administration amounted to £5770.

Fiscal Divisions.—For fiscal purposes Lohárdagá District is divided into forty-four *parganás*. Chutiá Nágpur Proper has only been surveyed topographically, and no return of the area of each Fiscal Division is available. The area of the Fiscal Division of Palámau, as shown below, is only the approximate area, ascertained by the Revenue Survey of 1862–66. The following is the list:—(1) Arangí, (2) Ardhe, (3) Báno, (4) Bantánajjám, (5) Baragaiá, (6) Baranda, (7) Barsiá, (8) Barwá or Barwé, (9) Belkadih, (10) Belsiá, (11) Bhaunrpahár, (12) Bírú, (13) Bundu, (14) Deorkhand, (15) Doisá, (16) Jashpur, (17) Jonhá, (18) Karanpurá, (19) Kátru, (20) Kásír, (21) Kasmár, (22) Kesalpur, (23) Khukhrá, (24) Koráme, (25) Lachrá, (26) Lodmmá, (27) Nawágarh, (28) Palámau, area, 3650 square miles; (29) Pálkot, (30) Panárí, (31) Ráhé, (32) Sasiá, (33) Sillí, (34) Síri, (35) Sónpur, (36) Sótiámé or Sutiámbé, (37) Talsá, (38) Támár, (39) Tórí, (40) Udaipur, (41) Umedandá, (42) Uparpát. In addition to the preceding *parganás*, the two following now belong to Lohárdagá, having been transferred from Gayá District in 1871:—(43) Belaunjeh, with an area of 470.54 square miles, or 301,146 acres, and 47 estates paying a land revenue of £1034, 6s.; (44) Japlá.

Medical: Climate.—The climate of the tableland of Chutiá Nágpur Proper is said to be superior to that of any other part of India, except the lower ranges of the Himálaya. The hot weather extends over at most six weeks, between the 20th April and the 10th June, and is never really oppressive. About this date the rainy season commences, and no more severe heat is felt until the following hot season. The rains cease about the first week in October; but they are irregular, sometimes commencing and closing earlier than the dates named. In the cold weather the thermometer has been known to fall to freezing point; and hoarfrost is deposited commonly between 15th November and 15th February. On the lower level, which lies below the plateau to the east at an elevation of not more than 800 feet above the sea, the climate nearly resembles that of Mánbhúm and of the western portion of Bánkurá District. Palámau, on the other hand, bordering on Mirzápur and Gayá Districts, has a climate more characteristic of South Behar. During the dry season, the thermometer ranges very high, and hot winds prevail, while the rainy season is said to be pleasant as well as healthy. But the

jungles are feverish during almost the whole year, and the river valleys retain their moisture so late, that it is not considered safe to go into camp before December.

The following statement, taken from Captain Depree's Survey Report shows the mean temperature of each month at 6 A.M. and at noon, for the eight years 1860–67, as observed at the jail hospital, Ránchí:—January, mean temperature at 6 A.M. 54°·6, mean temperature at noon 68°·8; February, at 6 A.M. 59°·1, at noon 75°·8; March, at 6 A.M. 67°·7, at noon 83°·7; April, at 6 A.M. 75°·0, at noon 92°·9; May, at 6 A.M. 70°·4, at noon 94°·8; June, at 6 A.M. 78°·3, at noon 90°·4; July, at 6 A.M. 75°·9, at noon 82°·3; August, at 6 A.M. 75°·0, at noon 81°·6; September, at 6 A.M. 74°·7, at noon 82°·5; October, at 6 A.M. 69°·3, at noon 81°·1; November, at 6 A.M. 60°·9, at noon 71°·8; December, at 6 A.M. 53°·7, at noon 69°·1. Mean annual temperature at 6 A.M. 68°·55, mean annual temperature at noon 81°·23; general mean temperature for the term of eight years 74°·89. The monthly rainfall for 1867–68 was as follows:—January, 1·35 inches; February, 1·00 inch; March, 0·25 inch; April, *nil*; May, 3·15 inches; June, 16·45 inches; July, 12·60 inches; August, 16·84 inches; September, 6·00 inches; October, 5·90 inches; November, *nil*; and December, 0·75 inch; the total annual rainfall, 64·29 inches.

Endemic Diseases of the District.—The only endemic disease in Lohárdagá is malarious fever. As to the precise nature of this disease little is known, but it is most severe in those parts of the District which are still covered with jungle. Cultivation, however, is continually advancing, and there can be no doubt that the fever decreases with the reclamation of the land. Rheumatism is common all over the District, and often cripples permanently the persons whom it attacks.

Epidemics.—Smallpox has appeared in the District in an epidemic form in the years 1860, 1861, and 1869. It is known that none of these outbreaks were serious; but there is no means of ascertaining what proportion of the population was attacked, or what was the general rate of mortality throughout the District. All the outbreaks were probably due to the operations of inoculators.

Cattle Disease has prevailed more or less for years in parts of the District, but no statistics are available to show exactly to what extent. The two forms of the disease that cause actual loss of life are said to be (1) *Basanta* or *guti*, in which the general symptoms are

those of fever. The animal refuses food and ceases to ruminate, the coat stares, and ears droop, &c., while the surface of the body is covered by the eruption of pustules. Death usually follows in a few days after the appearance of the eruption. *Basanta* is prevalent in the District more or less nearly every year. It is said to be brought by buffaloes imported *viâ* Palámau from the west. The mortality resulting from it is roughly estimated at 20 to 30 per cent. (2) *Dángar* is far more fatal than *basant*, but occurs much less often. The general symptoms are those of fever; but diarrhœa with watery evacuations, sometimes containing blood, is characteristic of the disease. There is also profuse salivation and peculiar convulsive movements of the body before death.

VACCINATION.—Act IV. (B.C.) of 1865 prohibiting the practice of inoculation was extended to the Chutiá Nágpur Division in 1869. The old inoculating agency consisted of from eight to twelve Brahman *tikáits* or professional inoculators, who came from Mánbhúm District and made a tour through Lohárdagá about once in every three or four years. Portions of Palámau Subdivision were probably visited by inoculators from Gayá, but of their operations nothing is known. It deserves notice that, when working in Lohárdagá, the *tikáits* did not adhere to their usual custom of inoculating in specific circumscribed areas, within which each inoculator has an exclusive right to exercise his profession, but wandered over the District taking such fees as they could get. Owing also to the large proportion of persons holding aboriginal faiths and not observing the usual Hindu ceremonies, their gains must have been much less in proportion to the number of persons inoculated than in Mánbhúm.

Some of the Hindu landholders have declined to allow their children to be vaccinated, but their example has had only a slight discouraging effect; while the Kols have taken to vaccination readily, and many of them have asked that vaccinators may be sent to their villages. During 1869–70, eight men were convicted and fined under the Act prohibiting inoculation. In January 1870, 200 persons were inoculated by some *tikáits* from Mánbhúm, and ten adults and two children out of the number died of smallpox. This was the only instance during the year of the introduction of smallpox into Lohárdagá by inoculation.

VITAL STATISTICS.—There are two selected areas, one urban and one rural, in Lohárdagá District for the collection of vital statistics. The urban area, which corresponds with the town of Ránchí itself,

contains a total population of 12,086, of whom 6860 are males and 5226 females. In this area, the municipal constables report the births occurring in the respective beats to a clerk paid from the municipal funds, and their reports are checked by the superior officers of the municipal police. Proclamation has been made in every section of the town that all births and deaths must be reported as they occur. Both cremation and interment are prohibited within municipal limits. In 1873, 480 deaths were returned from the town of Ránchí, showing a death-rate of 39·71 per 1000 of population. The Sanitary Commissioner considers the results to be fairly successful. The death-rate, however, considering the outbreak of epidemic cholera in that year and the infant mortality, was suspiciously low. The rural area of Palámau contains 9352 males and 9588 females, the total population being 18,940. The *chaukidárs* or village watchmen report all deaths to a clerk paid for the purpose, who registers the information, and from time to time verifies the reports of the *chaukidárs*. The clerk's returns are closely supervised by the inspector and head constable of the Police Circle. In 1873, 649 deaths were reported from the Palámau rural area, showing a death-rate of 34·26 per thousand. The Sanitary Commissioner considers the registration of the area to have had more than average success. The returns for the combined areas give 1129 deaths during 1873, giving a death-rate of 36·38 per 1000 of the population. This ratio was to a certain extent disturbed, as has been remarked above, by the exceptional prevalence of disease. But, apart from this, the registration shows a near approach to the actual facts—a result which is to a large extent traceable to the freedom of the aboriginal races from the ordinary Hindu prejudices against reporting the deaths of females.

Town Sanitation, &c.—In 1873, the sum of £278, 5s., or 39·80 per cent. of the total municipal income, was expended on sanitary improvements in the town of Ránchí; of which £111, 2s., or 15·95 per cent. of the whole, was devoted to conservancy, and £167, 2s. 10d., or 23·99 per cent., to opening up fresh roads. Drainage was carefully attended to, and lines of streets were demarcated where future buildings were likely to stand, so as to prevent overcrowding. A well was also commenced in a central portion of the town.

The cantonment of Dorandá is healthily situated on high ground with a good slope for surface drainage. The barracks, which are built of sun-dried bricks with a tiled roof, are stated to be very

healthy. The water supply is good, and the sanitary arrangements within the lines are efficiently carried out.

CHARITABLE DISPENSARIES.—There are two charitable dispensaries in Lohárdagá District. The following brief account of each is condensed from the Report on the Charitable Dispensaries under the Government of Bengal for 1872.

RÁNCHÍ DISPENSARY, established in 1855, is in charge of a native doctor paid from local funds. The total number of indoor patients treated in 1872 was 146; relieved or cured, 106; not improved, 2; died, 31, or 21·23 per cent. of the total number treated; remaining at end of year, 7; daily average number of sick during the year, 6·95. Outdoor patients: total number treated, 1789; average daily attendance, 22·01. The total income during the year from Government and private sources amounted to £139, 16s.; and the expenditure to £145, 10s.; excess of debit over the credits, £5, 14s. The new dispensary building, which can accommodate from nineteen to twenty-two indoor patients, was opened in 1872. No important operations were performed during the year; but much useful work was done. The death-rate was high, being 21·23 per cent. against 20·50 in the previous year, which is said to be owing to the number of moribund cases admitted.

PALÁMAU—DALTONGANJ DISPENSARY, in the Palámau Subdivision, established in February 1867, was in 1872 under the charge of a native sub-assistant surgeon. The dispensary building, which can accommodate eight indoor patients, was repaired and improved during the year. The attendance increased, and several important operations were performed. The year was healthy, and no epidemic prevailed. The funds subscribed locally to the dispensary hardly suffice for its maintenance. The total income during the year 1872 from Government and private sources amounted to £157, 18s., and the expenditure to £170, 10s.; making a debit of £12, 12s. over the credits. Indoor patients in 1872: total cases treated, 94; relieved or cured, 79; died, 6, or 6·38 per cent. of the total cases; remaining at end of year, 9; daily average number of sick during the year, 7·5. Outdoor patients: total number treated, 2229; the average daily attendance at the dispensary being 36·4.

ADDENDUM.—Since the preceding pages were printed off, I have received the following additional materials, which should have been inserted among 'Places of Interest' on p. 323.

CHOKAHÁTU, or "the place of mourning," is a village in the south-east of Lohárdagá District, in the Fiscal Division of Tamár. It takes its name from a large burial ground, covering an area of seven acres, and containing more than 7000 tombs, which is still used by the Mundas of Chokahátu, and of nine surrounding villages. From the large size of this, and of some neighbouring *hargaris* or collections of monuments, it has been conjectured that this portion of the Subarnarekhá valley may have been one of the earliest settlements of the Munda race. It appears, however, that in the *lutur desum* or 'low country' below the plateau every Munda family has its own monumental slab, an honour which on the table-land round Ránchí is only accorded to the *múnda* or village head-man, and the *bhuinhárs* or descendants of the earliest settlers in the village.

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